FORM 3

STATE OF UTAH
DEPARTMENT OF NATURAL RESOURCES
DIVISION OF OIL, GAS AND MINING

AMENDED REPORT ☐

APPLICATION FOR PERMIT TO DRILL		1. WELL NAME and NUMBER: NBU 922-30D3DS
2. TYPE OF WORK: DRILL NEW WELL (●) REENTER P&A WELL ( ) DEEPEN WELL ( )		3. FIELD OR WILDCAT: NATURAL BUTTES
4. TYPE OF WELL: Gas Well Coalbed Methane Well: NO		5. UNIT or COMMUNITIZATION AGREEMENT NAME: NATURAL BUTTES
6. NAME OF OPERATOR: KERR-MCGEE OIL & GAS ONSHORE, L.P.		7. OPERATOR PHONE: 720 929-6587
8. ADDRESS OF OPERATOR: P.O. Box 173779, Denver, CO, 80217		9. OPERATOR E-MAIL: mary.mondragon@anadarko.com
10. MINERAL LEASE NUMBER (FEDERAL, INDIAN, OR STATE): UTU 0463	11. MINERAL OWNERSHIP: FEDERAL (●) INDIAN ( ) STATE ( ) FEE ( )	12. SURFACE OWNERSHIP: FEDERAL (●) INDIAN ( ) STATE ( ) FEE ( )
13. NAME OF SURFACE OWNER (if box 12 = 'fee')		14. SURFACE OWNER PHONE (if box 12 = 'fee')
15. ADDRESS OF SURFACE OWNER (if box 12 = 'fee')		16. SURFACE OWNER E-MAIL (if box 12 = 'fee')
17. INDIAN ALLOTTEE OR TRIBE NAME (if box 12 = 'INDIAN')	18. INTEND TO COMMINGLE PRODUCTION FROM MULTIPLE FORMATIONS: YES (●) (Submit Commingling Application) NO ( )	19. SLANT: VERTICAL ( ) DIRECTIONAL (●) HORIZONTAL ( )

20. LOCATION OF WELL	FOOTAGES	QTR-QTR	SECTION	TOWNSHIP	RANGE	MERIDIAN
LOCATION AT SURFACE	1226 FNL 588 FWL	NWNW	30	9.0 S	22.0 E	S
Top of Uppermost Producing Zone	1314 FNL 352 FWL	NWNW	30	9.0 S	22.0 E	S
At Total Depth	1314 FNL 352 FWL	NWNW	30	9.0 S	22.0 E	S

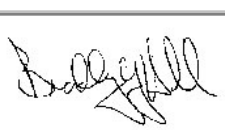
21. COUNTY: UINTAH	22. DISTANCE TO NEAREST LEASE LINE (Feet): 352	23. NUMBER OF ACRES IN DRILLING UNIT: 551
	25. DISTANCE TO NEAREST WELL IN SAME POOL (Applied For Drilling or Completed): 250	26. PROPOSED DEPTH: MD: 9613 TVD: 9600
27. ELEVATION - GROUND LEVEL: 4927	28. BOND NUMBER: WYB000291	29. SOURCE OF DRILLING WATER / WATER RIGHTS APPROVAL NUMBER IF APPLICABLE: Permit #43-8496

ATTACHMENTS

VERIFY THE FOLLOWING ARE ATTACHED IN ACCORDANCE WITH THE UTAH OIL AND GAS CONSERVATION GENERAL RULES

☑ WELL PLAT OR MAP PREPARED BY LICENSED SURVEYOR OR ENGINEER	☑ COMPLETE DRILLING PLAN
☐ AFFIDAVIT OF STATUS OF SURFACE OWNER AGREEMENT (IF FEE SURFACE)	☐ FORM 5. IF OPERATOR IS OTHER THAN THE LEASE OWNER
☑ DIRECTIONAL SURVEY PLAN (IF DIRECTIONALLY OR HORIZONTALLY DRILLED)	☑ TOPOGRAPHICAL MAP

NAME Danielle Piernot	TITLE Regulatory Analyst	PHONE 720 929-6156
SIGNATURE	DATE 08/17/2009	EMAIL danielle.piernot@anadarko.com

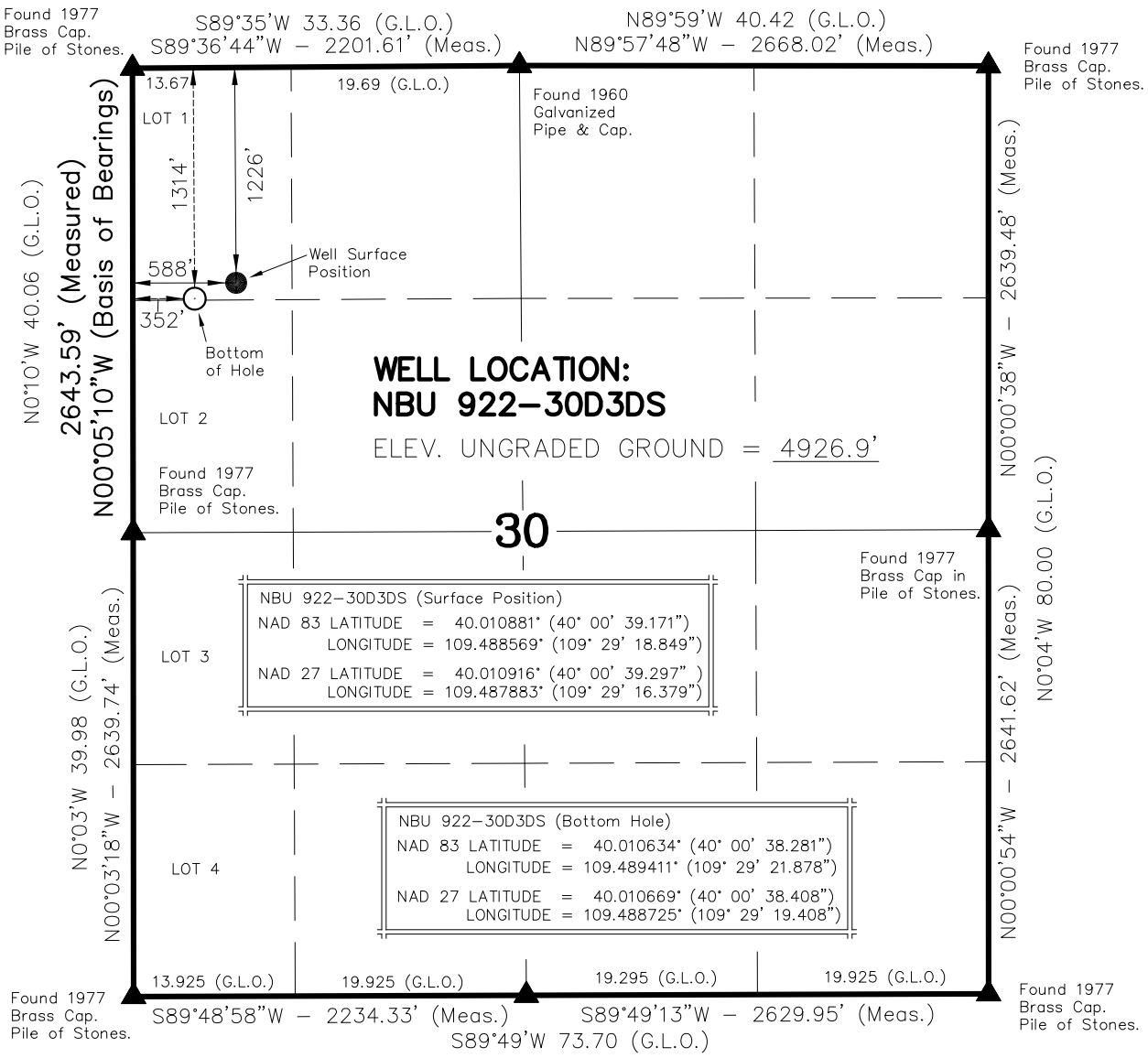
API NUMBER ASSIGNED	APPROVAL
43047506550000	 Permit Manager

Proposed Hole, Casing, and Cement						
String	**Hole Size**	**Casing Size**	**Top (MD)**	**Bottom (MD)**		
Prod	7.875	4.5	0	9613		
Pipe	**Grade**	**Length**	**Weight**			
	Grade I-80 Buttress	9613	11.6			

Proposed Hole, Casing, and Cement						
String	**Hole Size**	**Casing Size**	**Top (MD)**	**Bottom (MD)**		
Surf	12.25	9.625	0	2460		
Pipe	**Grade**	**Length**	**Weight**			
	Grade J-55 LT&C	2460	36.0			

'APIWellNo:43047506550000'

T9S, R22E, S.L.B.&M.



NOTES:

▲ = Section Corners Located

1. Well footages are measured at right angles to the Section Lines.
2. G.L.O. distances are shown in feet or chains. 1 chain = 66 feet.
3. The Bottom of hole bears S69°06'54W" 252.44' from the Surface Position.
4. Bearings are based on Global Positioning Satellite observations.
5. Basis of elevation is Tri-Sta "Two Water" located in the NW ¼ of Section 1, T10S, R21E, S.L.B.&M. The elevation of this Tri-Sta is shown on the Big Pack Mtn NE 7.5 Min. Quadrangle as being 5238'.

N

1000' 500' 0' 1000'

SCALE

SURVEYOR'S CERTIFICATE

THIS IS TO CERTIFY THAT THE ABOVE PLAT WAS PREPARED FROM FIELD NOTES OF ACTUAL SURVEYS MADE BY ME OR UNDER MY SUPERVISION AND THAT THE SAME ARE TRUE AND CORRECT TO THE BEST OF MY KNOWLEDGE AND BELIEF.

REGISTERED LAND SURVEYOR No.362251 KOLBY R. KAY STATE OF UTAH

Kolby R. Kay

REGISTERED LAND SURVEYOR
REGISTRATION No. 362251
STATE OF UTAH

Kerr-McGee Oil & Gas Onshore, LP
1099 18th Street – Denver, Colorado 80202

NBU 922-30D3DS
WELL PLAT
1314' FNL, 352' FWL (Bottom Hole)
LOT 1 OF SECTION 30, T9S, R22E,
S.L.B.&M. UINTAH COUNTY, UTAH.

609 CONSULTING, LLC
371 Coffeen Avenue
Sheridan WY 82801
Phone 307-674-0609
Fax 307-674-0182

TIMBERLINE (435) 789-1365
ENGINEERING & LAND SURVEYING, INC.
209 NORTH 300 WEST – VERNAL, UTAH 84078

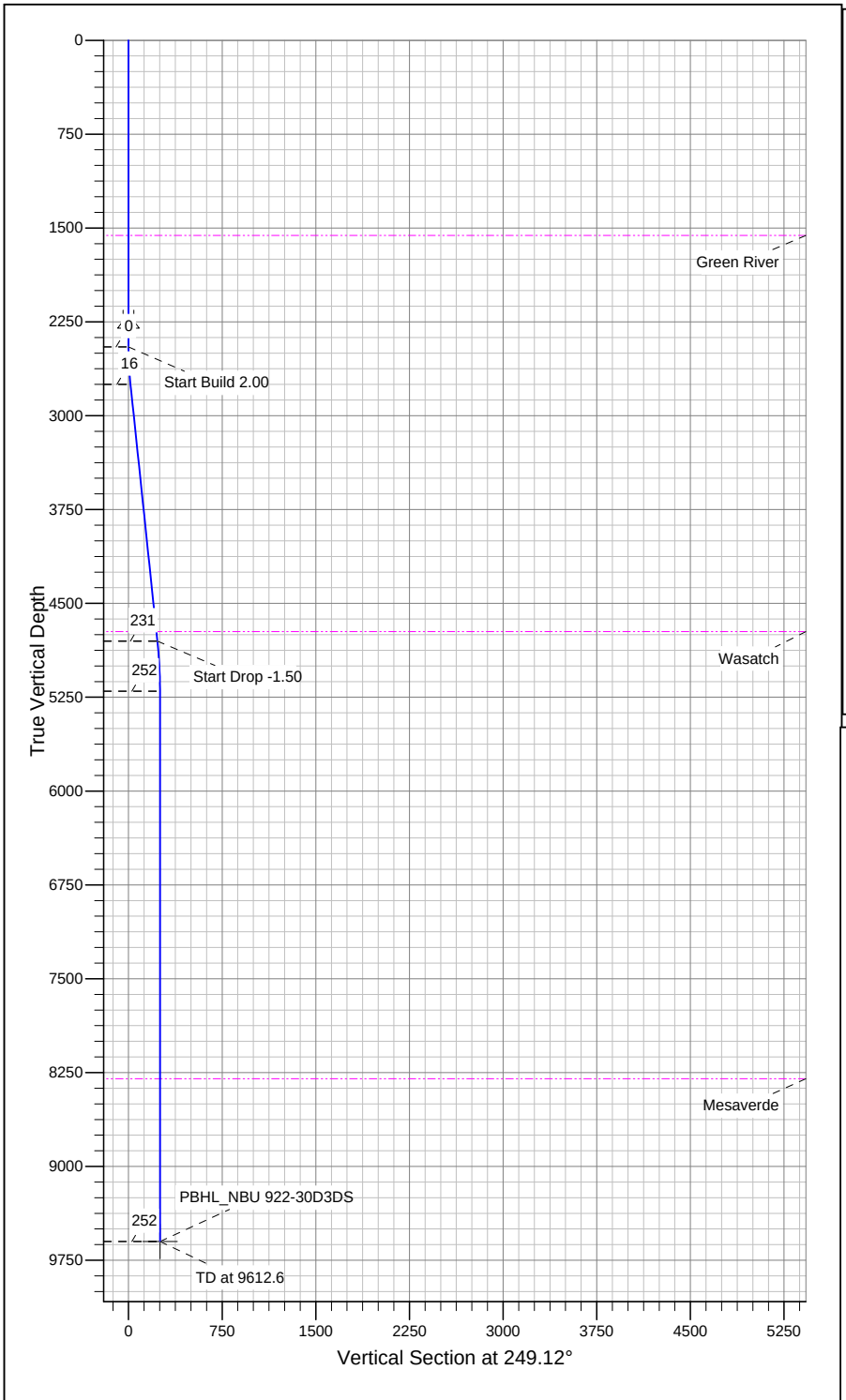
DATE SURVEYED: 9-10-08	SURVEYED BY: M.S.B.	SHEET 3 OF 13
DATE DRAWN: 9-26-08	DRAWN BY: E.M.S.	
SCALE: 1" = 1000'	Date Last Revised: 01-21-09	

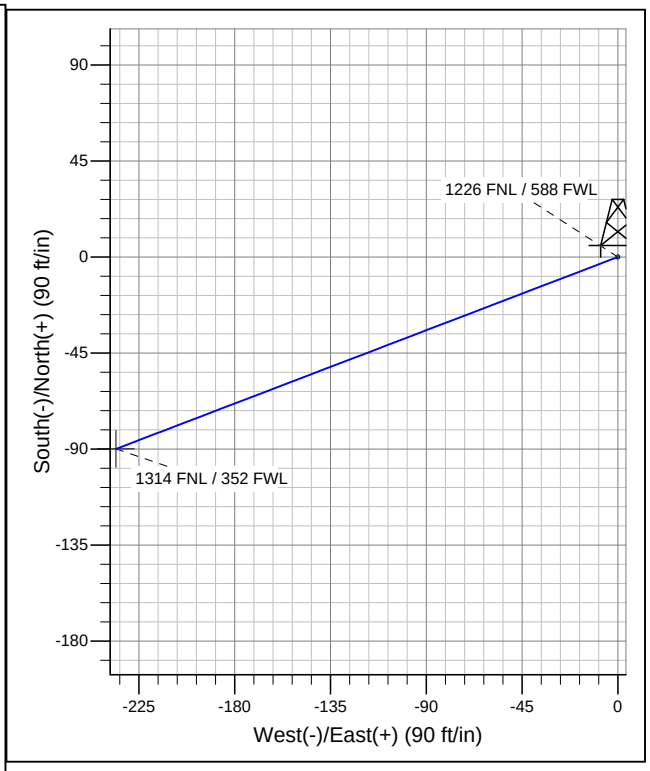
’APIWellNo:43047506550000’

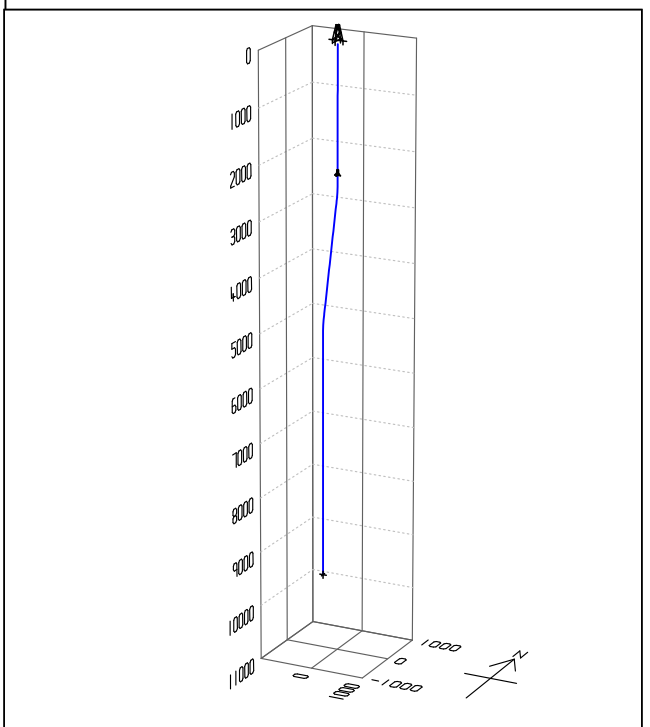
Anadarko Petroleum Corporation

Well Name: P_NBU 922-30D3DS
Surface Location: UINTAH_NBU 922-30D PAD
NAD 1927 (NADCON CONUS) Universal Transverse Mercator (US Survey Feet)
UTAH - UTM (feet), NAD27, Zone 12N
Ground Elevation: 4927.0

Northing	Easting	Latitude	Longitude
14533612.02	2063838.78	40.010916°N	109.487883°W

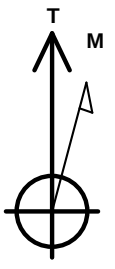






SECTION DETAILS

Sec	MD	Inc	Azi	TVD	+N/-S	+E/-W	DLeg	TFace	VSec
1	0.0	0.00	0.00	0.0	0.0	0.0	0.00	0.00	0.0
2	2450.0	0.00	0.00	2450.0	0.0	0.0	0.00	0.00	0.0
3	2750.0	6.00	249.12	2749.5	-5.6	-14.7	2.00	249.12	15.7
4	4814.3	6.00	249.12	4802.4	-82.5	-216.3	0.00	0.00	231.5
5	5214.3	0.00	0.00	5201.7	-90.0	-235.8	1.50	180.00	252.4
6	9612.6	0.00	0.00	9600.0	-90.0	-235.8	0.00	0.00	252.4



Azimuths to True North
Magnetic North: 11.33°

Magnetic Field
Strength: 52579.2snT
Dip Angle: 65.94°
Date: 4/16/2009
Model: IGRF200510

ROCKIES - PLANNING

UTAH - UTM (feet), NAD27, Zone 12N
UINTAH_NBU 922-30D PAD
P_NBU 922-30D3DS
P_NBU 922-30D3DS

Plan: Plan #1 04-16-09 ZJRA6

Standard Planning Report - Geographic

16 April, 2009

APC

Planning Report - Geographic

Database:	apc_edmp	**Local Co-ordinate Reference:**	Well P_NBU 922-30D3DS
Company:	ROCKIES - PLANNING	**TVD Reference:**	WELL @ 4927.0ft (Original Well Elev)
Project:	UTAH - UTM (feet), NAD27, Zone 12N	**MD Reference:**	WELL @ 4927.0ft (Original Well Elev)
Site:	UINTAH_NBU 922-30D PAD	**North Reference:**	True
Well:	P_NBU 922-30D3DS	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	P_NBU 922-30D3DS		
Design:	Plan #1 04-16-09 ZJRA6		

Project UTAH - UTM (feet), NAD27, Zone 12N

Map System:	Universal Transverse Mercator (US Survey Fee	**System Datum:**	Mean Sea Level
Geo Datum:	NAD 1927 (NADCON CONUS)		
Map Zone:	Zone 12N (114 W to 108 W)		

Site UINTAH_NBU 922-30D PAD

Site Position:		**Northing:**	14,533,612.02 ft	**Latitude:**	40.010916°N
From:	Lat/Long	**Easting:**	2,063,838.78 ft	**Longitude:**	109.487883°W
Position Uncertainty:	0.0 ft	**Slot Radius:**	"	**Grid Convergence:**	0.97 °

Well P_NBU 922-30D3DS

Well Position	**+N/-S**	0.0 ft	**Northing:**	14,533,612.02 ft	**Latitude:**	40.010916°N
	+E/-W	0.0 ft	**Easting:**	2,063,838.78 ft	**Longitude:**	109.487883°W
Position Uncertainty		0.0 ft	**Wellhead Elevation:**	ft	**Ground Level:**	4,927.0 ft

Wellbore P_NBU 922-30D3DS

Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF200510	4/16/2009	11.33	65.94	52,579

Design Plan #1 04-16-09 ZJRA6

Audit Notes:

Version:		**Phase:**	PLAN	**Tie On Depth:**	0.0

Vertical Section:	Depth From (TVD) (ft)	+N/-S (ft)	+E/-W (ft)	Direction (°)
	9,600.0	0.0	0.0	249.12

Plan Sections

Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)	TFO (°)	Target
0.0	0.00	0.00	0.0	0.0	0.0	0.00	0.00	0.00	0.00	
2,450.0	0.00	0.00	2,450.0	0.0	0.0	0.00	0.00	0.00	0.00	
2,750.0	6.00	249.12	2,749.5	-5.6	-14.7	2.00	2.00	0.00	249.12	
4,814.3	6.00	249.12	4,802.4	-82.5	-216.3	0.00	0.00	0.00	0.00	
5,214.3	0.00	0.00	5,201.7	-90.0	-235.8	1.50	-1.50	0.00	180.00	
9,612.6	0.00	0.00	9,600.0	-90.0	-235.8	0.00	0.00	0.00	0.00	PBHL_NBU 922-30

APC

Planning Report - Geographic

Database:	apc_edmp	**Local Co-ordinate Reference:**	Well P_NBU 922-30D3DS
Company:	ROCKIES - PLANNING	**TVD Reference:**	WELL @ 4927.0ft (Original Well Elev)
Project:	UTAH - UTM (feet), NAD27, Zone 12N	**MD Reference:**	WELL @ 4927.0ft (Original Well Elev)
Site:	UINTAH_NBU 922-30D PAD	**North Reference:**	True
Well:	P_NBU 922-30D3DS	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	P_NBU 922-30D3DS		
Design:	Plan #1 04-16-09 ZJRA6		

Planned Survey

Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Map Northing (ft)	Map Easting (ft)	Latitude	Longitude
0.0	0.00	0.00	0.0	0.0	0.0	14,533,612.02	2,063,838.78	40.010916°N	109.487883°W
1,559.0	0.00	0.00	1,559.0	0.0	0.0	14,533,612.02	2,063,838.78	40.010916°N	109.487883°W
Green River									
2,300.0	0.00	0.00	2,300.0	0.0	0.0	14,533,612.02	2,063,838.78	40.010916°N	109.487883°W
Surface Casing									
2,450.0	0.00	0.00	2,450.0	0.0	0.0	14,533,612.02	2,063,838.78	40.010916°N	109.487883°W
2,750.0	6.00	249.12	2,749.5	-5.6	-14.7	14,533,606.18	2,063,824.21	40.010901°N	109.487935°W
4,736.4	6.00	249.12	4,725.0	-79.6	-208.7	14,533,528.89	2,063,631.49	40.010697°N	109.488628°W
Wasatch									
4,814.3	6.00	249.12	4,802.4	-82.5	-216.3	14,533,525.86	2,063,623.94	40.010689°N	109.488655°W
5,214.3	0.00	0.00	5,201.7	-90.0	-235.8	14,533,518.07	2,063,604.52	40.010669°N	109.488725°W
8,311.6	0.00	0.00	8,299.0	-90.0	-235.8	14,533,518.07	2,063,604.52	40.010669°N	109.488725°W
Mesaverde									
9,612.6	0.00	0.00	9,600.0	-90.0	-235.8	14,533,518.07	2,063,604.52	40.010669°N	109.488725°W

Targets

Target Name - hit/miss target - Shape	Dip Angle (°)	Dip Dir. (°)	TVD (ft)	+N/-S (ft)	+E/-W (ft)	Northing (ft)	Easting (ft)	Latitude	Longitude
PBHL_NBU 922-30D3 - plan hits target center - Point	0.00	0.00	9,600.0	-90.0	-235.8	14,533,518.07	2,063,604.52	40.010669°N	109.488725°W

Casing Points

Measured Depth (ft)	Vertical Depth (ft)	Name	Casing Diameter (")	Hole Diameter (")
2,300.0	2,300.0	Surface Casing	9-5/8	12-1/4

Formations

Measured Depth (ft)	Vertical Depth (ft)	Name	Lithology	Dip (°)	Dip Direction (°)
1,559.0	1,559.0	Green River		0.00	
8,311.6	8,299.0	Mesaverde		0.00	
4,736.4	4,725.0	Wasatch		0.00	

NBU 922-30D3DS

Pad: NBU 922-30D
Surface: 1,226' FNL 588' FWL (NW/4NW/4) Lot 1
BHL: 1,314' FNL 352' FWL (NW/4NW/4) Lot 1
Sec. 30 T9S R22E

Uintah, Utah
Mineral Lease: UTU 0463

ONSHORE ORDER NO. 1

DRILLING PROGRAM

1. – 2. Estimated Tops of Important Geologic Markers:
Estimated Depths of Anticipated Water, Oil, Gas, or Mineral Formations:

Formation	Depth	Resource
Uinta	0 – Surface	
Green River	1,559'	
Birds Nest	1,789'	Water
Mahogany	2,260'	Water
Wasatch	4,725'	Gas
Mesaverde	7,369'	Gas
MVU2	8,299'	Gas
MVL1	8,948'	Gas
TVD	9,600'	
TD	9,613'	

3. Pressure Control Equipment (Schematic Attached)

Please refer to the attached Drilling Program.

4. Proposed Casing & Cementing Program:

Please refer to the attached Drilling Program.

5. Drilling Fluids Program:

Please refer to the attached Drilling Program.

6. Evaluation Program:

Please refer to the attached Drilling Program.

7. Abnormal Conditions:

Maximum anticipated bottomhole pressure calculated at 9,600' TVD, approximately equals 5,881 psi (calculated at 0.61 psi/foot).

Maximum anticipated surface pressure equals approximately 3,769 psi (bottomhole pressure minus the pressure of a partially evacuated hole calculated at 0.22 psi/foot).

8. Anticipated Starting Dates:

Drilling is planned to commence immediately upon approval of this application.

9. Variances:

Please refer to the attached Drilling Program.
Onshore Order #2 – Air Drilling Variance

Kerr-McGee Oil & Gas Onshore LP (KMG) respectfully requests a variance to several requirements associated with air drilling outlined in Onshore Order 2

- *Blowout Prevention Equipment (BOPE) requirements;*
- *Mud program requirements; and*
- *Special drilling operation (surface equipment placement) requirements associated with air drilling.*

This Standard Operating Practices addendum provides supporting information as to why KMG current air drilling practices for constructing the surface casing hole should be granted a variance to Onshore Order 2 air drilling requirements.

The reader should note that the air rig is used only to construct a stable surface casing hole through a historically difficult lost circulation zone. A conventional rotary rig follows the air rig, and is used to drill and construct the majority of the wellbore.

More notable, KMG has used the air rig layout and procedures outlined below to drill the surface casing hole in approximately 675 wells without incident of blow out or loss of life.

Background

In a typical well, KMG utilizes an air rig for drilling the surface casing hole, an interval from the surface to surface casing depths, which varies in depth from 1,700 to 2,800 feet. The air rig drilling operation does not drill through productive or over pressured formations in KMG field, but does penetrate the Uinta and Green River Formations. The purpose of the air drilling operation is to overcome the severe loss circulation zone in the Green River known as the Bird's Nest while creating a stable hole for the surface casing. The surface casing hole is generally drilled to approximately 500 feet below the Bird's Nest.

Before the surface air rig is mobilized, a rathole rig is utilized to set and cement conductor pipe through a competent surface formation. Generally, the conductor is set at 40 feet. In some cases, conductor may be set deeper in areas that the surface formation is not found competent. This rig also drills the rat and mouse holes in preparation for the surface casing and production string drilling operations.

The air rig is then mobilized to drill the surface casing hole by drilling a 12-1/4 inch hole to just above the Bird's Nest interval with an air hammer. The hammer is then tripped and replaced with a 12-1/4 inch tri-cone bit. The tri-cone bit is used to drill to the surface casing point, approximately 500 feet below the loss circulation zone (Bird's Nest). The 9-5/8 inch surface casing is then run and cemented in place, thereby isolating the lost circulation zone.

KMG fully appreciates Onshore Order 2 well control and safety requirements associated with a typical air drilling operations. However, the requirements of Onshore Order 2 are excessive with respect to the air rig layout and drilling operation procedures that are currently in practice to drill and control the surface casing hole in KMG Fields.

Variance for BOPE Requirements
The air rig operation utilizes a properly lubricated and maintained air bowl diverter system which diverts the drilling returns to a six-inch blooie line. The air bowl is the only piece of BOPE equipment which is installed during drilling operations and is sufficient to contain the air returns associated with this drilling operation. As was discussed earlier, the drilling of the surface hole does not encounter any over pressured or productive zones, and as a result standard BOPE equipment should not be required. In addition, standard drilling practices do not support the use of BOPE on 40 feet of conductor pipe.

Variance for Mud Material Requirements
Onshore Order 2 also states that sufficient quantities of mud materials shall be maintained or readily accessible for the purpose of assuring adequate well control. Once again, the surface hole drilling operations does not encounter over pressured or productive intervals, and as a result there is not a need to control pressure in the surface hole with a mud system. Instead of mud, the air rigs utilize water from the reserve pit for well control, if necessary. A skid pump which is located near the reserve pit (see attachment) will supply the water to the well bore.

Variance for Special Drilling Operation (surface equipment placement) Requirements
Onshore Order 2 requires specific safety distances or setbacks for the placement of associated standard air drilling equipment, wellbore, and reserve pits. The air rigs used to drill the surface holes are not typical of an air rig used to drill a producing hole in other parts of the US. These are smaller in nature and designed to fit a KMG location. The typical air rig layout for drilling surface hole in the field is attached.

Typically the blooie line discharge point is required to be 100 feet from the well bore. In the case of a KMG well, the reserve pit is only 45 feet from the rig and is used for the drill cuttings. The blooie line, which transports the drill cuttings from the well to the reserve pit, subsequently discharges only 45 feet from the well bore.

Typically the air rig compressors are required to be located in the opposite direction from the blooie line and a minimum of 100 feet from the well bore. At the KMG locations, the air rig compressors are approximately 40 feet from the well bore and approximately 60 feet from the blooie line discharge due to the unique air rig design. The air compressors (see attachment) are located on the rig (1250 cfm) and on a standby trailer (1170 cfm). A booster sits between the two compressors and boosts the output from 350 psi to 2000 psi. The design does put the booster and standby compressor opposite from the blooie line.

Lastly, Onshore Order 2 addresses the need for an automatic igniter or continuous pilot light on the blooie line. The air rig does not utilize an igniter as the surface hole drilling operation does not encounter productive formations.

Variance for FIT Requirements
KMG also respectfully requests a variance to Onshore Order 2, Section III, Part Bi, for the pressure integrity test (PIT, also known as a formation integrity test (FIT)). The air rig operation utilizes a 5M BOPE when drilling. This well is not an exploratory well and is being drilled in an area where the formation integrity is well known. Additionally, when an FIT is run with the mud weight as required, the casing shoe frequently breaks down and causes subsequent lost circulation when drilling the entire depth of the well.

Conclusion
The air rig operating procedures and the attached air rig layout have effectively maintained well control while drilling the surface holes in KMG Fields. KMG respectfully requests a variance from Onshore Order 2 with respect to air drilling well control requirements as discussed above.

10. Other Information:

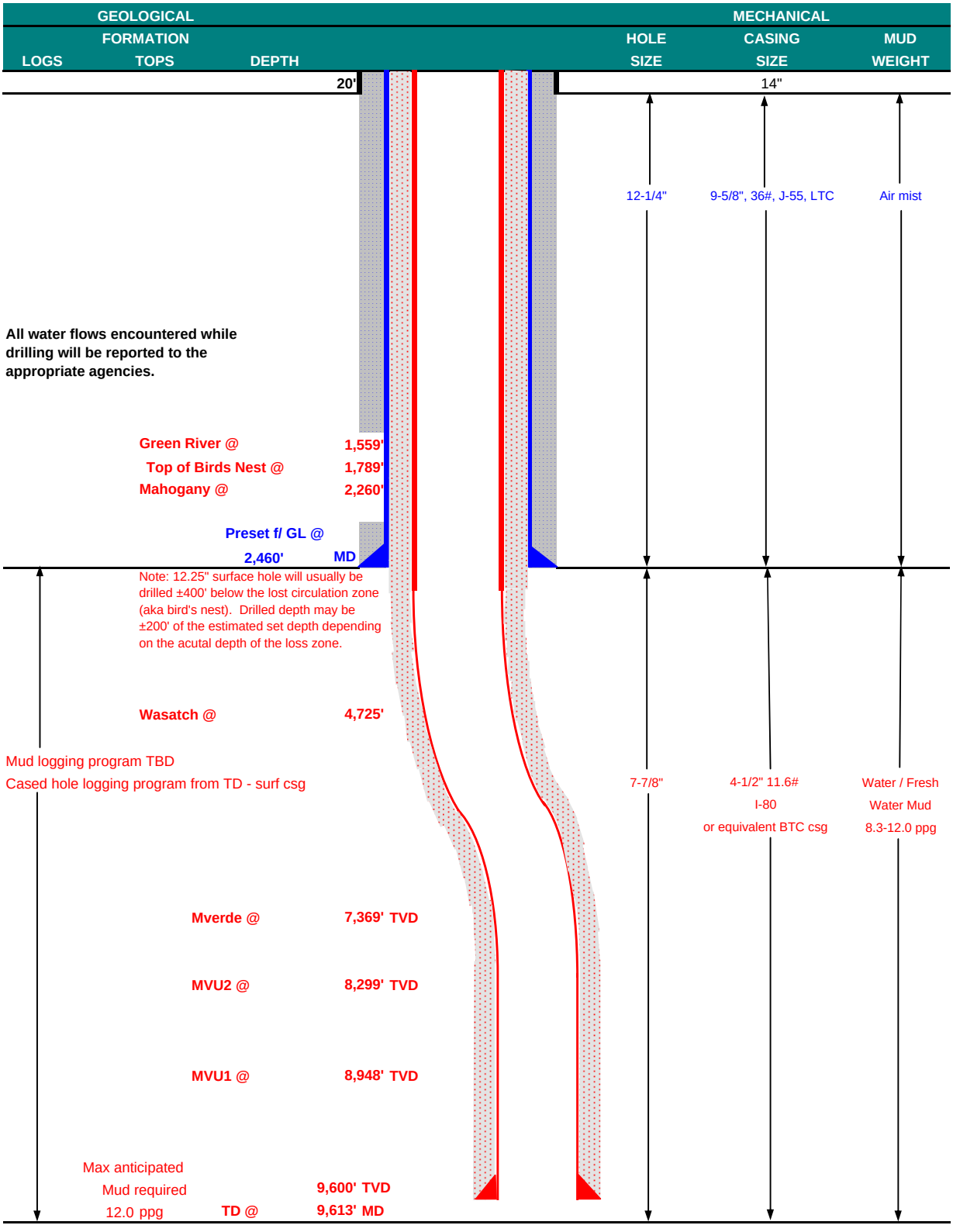
Please refer to the attached Drilling Program.

’APIWellNo:43047506550000’

KERR-McGEE OIL & GAS ONSHORE LP

DRILLING PROGRAM

COMPANY NAME	KERR-McGEE OIL & GAS ONSHORE LP		DATE	August 17, 2009	
WELL NAME	**NBU 922-30D3DS**		TD	9,600' TVD	9,613' MD
FIELD	Natural Buttes	COUNTY Uintah	STATE Utah	FINISHED ELEVATION	4,927'
SURFACE LOCATION	NW/4 NW/4 1,226' FNL	588' FWL	Sec 30	T 9S R 22E	Lot 1
	Latitude: 40.010881	Longitude: -109.488569			NAD 83
BTM HOLE LOCATION	NW/4 NW/4 1,314' FNL	352' FWL	Sec 30	T 9S R 22E	Lot 1
	Latitude: 40.010634	Longitude: -109.489411			NAD 83
OBJECTIVE ZONE(S)	Wasatch/Mesaverde				
ADDITIONAL INFO	Regulatory Agencies: BLM (Minerals), BLM (Surface), UDOGM Tri-County Health Dept.				



'APIWellNo:43047506550000'

KERR-McGEE OIL & GAS ONSHORE LP

DRILLING PROGRAM

CASING PROGRAM

	SIZE	INTERVAL			WT.	GR.	CPLG.	DESIGN FACTORS BURST	COLLAPSE	TENSION
CONDUCTOR	14"	0-40'								
								3,520	2,020	453,000
SURFACE	9-5/8"	0	to	2,460	36.00	J-55	LTC	0.91	1.75	6.51
								7,780	6,350	278,000
PRODUCTION	4-1/2"	0	to	9,613	11.60	I-80	BTC	2.01	1.06	2.86

1) Max Anticipated Surf. Press.(MASP) (Surface Casing) = (Pore Pressure at next csg point-(0.22 psi/ft-partial evac gradient x TVD of next csg point))

2) MASP (Prod Casing) = Pore Pressure at TD - (0.22 psi/ft-partial evac gradient x TD)
(Burst Assumptions: TD = 12.0 ppg) 0.22 psi/ft = gradient for partially evac wellbore
(Collapse Assumption: Fully Evacuated Casing, Max MW) (Tension Assumptions: Air Weight of Casing*Buoy.Fact. of water)
MASP 3,769 psi

3) Maximum Anticipated Bottom Hole Pressure (MABHP) = Pore Pressure at TD
(Burst Assumptions: TD = 12.0 ppg) 0.61 psi/ft = bottomhole gradient
(Collapse Assumption: Fully Evacuated Casing, Max MW) (Tension Assumptions: Air Weight of Casing*Buoy.Fact. of water)
MABHP 5,881 psi

CEMENT PROGRAM

		FT. OF FILL	DESCRIPTION	SACKS	EXCESS	WEIGHT	YIELD
SURFACE	LEAD	500'	Premium cmt + 2% CaCl	215	60%	15.60	1.18
Option 1			+ 0.25 pps flocele				
	TOP OUT CMT (6 jobs)	1,200'	20 gals sodium silicate + Premium cmt	380	0%	15.60	1.18
			+ 2% CaCl + 0.25 pps flocele				
			Premium cmt + 2% CaCl				
SURFACE			**NOTE: If well will circulate water to surface, option 2 will be utilized**				
Option 2	LEAD	1,960'	65/35 Poz + 6% Gel + 10 pps gilsonite	460	35%	12.60	1.81
			+ 0.25 pps Flocele + 3% salt BWOW				
	TAIL	500'	Premium cmt + 2% CaCl	180	35%	15.60	1.18
			+ 0.25 pps flocele				
	TOP OUT CMT	as required	Premium cmt + 2% CaCl	as req.		15.60	1.18
PRODUCTION	LEAD	4,223'	Premium Lite II + 3% KCl + 0.25 pps	400	40%	11.00	3.38
			celloflake + 5 pps gilsonite + 10% gel				
			+ 0.5% extender				
	TAIL	5,390'	50/50 Poz/G + 10% salt + 2% gel	1,320	40%	14.30	1.31
			+ 0.1% R-3				

*Substitute caliper hole volume plus 0% excess for LEAD if accurate caliper is obtained
*Substitute caliper hole volume plus 10% excess for TAIL if accurate caliper is obtained

FLOAT EQUIPMENT & CENTRALIZERS

SURFACE	Guide shoe, 1 jt, insert float. Centralize first 3 joints with bow spring centralizers. Thread lock guide shoe
PRODUCTION	Float shoe, 1 jt, float collar. No centralizers will be used.

ADDITIONAL INFORMATION

Test casing head to 750 psi after installing. Test surface casing to 1,500 psi prior to drilling out.

BOPE: 11" 5M with one annular and 2 rams. The BOPE will be installed before the production hole is drilled and tested to 5,000 psi (annular to 2,500 psi) prior to drilling out the surface casing shoe. Record on chart recorder and tour sheet. Function test rams on each trip. Maintain safety valve and inside BOP on rig floor at all times. Most rigs have top drives; however, if used, the Kelly is to be equipped with upper and lower kelly valves.

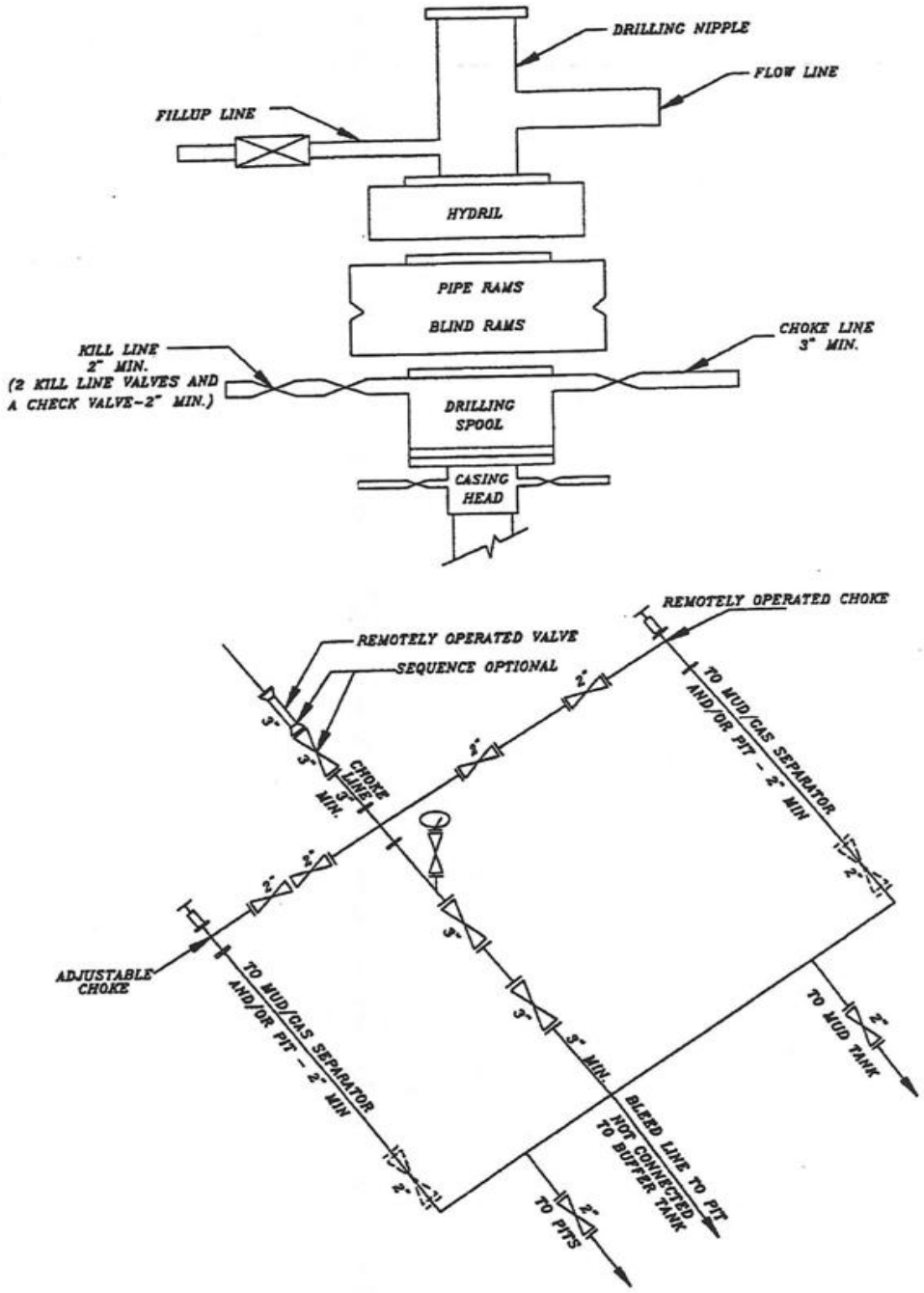
Surveys will be taken at 1,000' minimum intervals.

Most rigs have PVT System for mud monitoring. If no PVT is available, visual monitoring will be utilized.

DRILLING ENGINEER: _____ **DATE:** _____
John Huycke / Emile Goodwin

DRILLING SUPERINTENDENT: _____ **DATE:** _____
John Merkel / Lovel Young

EXHIBIT A
NBU 922-30D3DS



SCHEMATIC DIAGRAM OF 5,000 PSI BOP STACK

WELL PAD INTERFERENCE PLAT

DIRECTIONAL PAD – NBU 78

SURFACE POSITION FOOTAGES:

NBU 922–30E2AS
1246' FNL & 645' FWL

NBU 922–30D3AS
1232' FNL & 607' FWL

NBU 922–30D3DS
1226' FNL & 588' FWL

NBU 922–30C3S
1253' FNL & 663' FWL

NBU 78 (Existing Well Head)
1239' FNL & 626' FWL

BOTTOM HOLE FOOTAGES

NBU 922–30E2AS
1636' FNL & 352' FWL

NBU 922–30D3AS
680' FNL & 382' FWL

NBU 922–30D3DS
1314' FNL & 352' FWL

NBU 922–30C3S
1238' FNL & 1154' FWL

BASIS OF BEARINGS IS THE WEST LINE OF THE NW 1/4 OF SECTION 30, T9S, R22E, S.L.B.&M. WHICH IS TAKEN FROM GLOBAL POSITIONING SATELLITE OBSERVATIONS TO BEAR N00°05'10"W.

N

Az=337.72528°
N22°16'29"W – 595.31'
(To Bottom Hole)

LATITUDE & LONGITUDE
Surface Position – (NAD 83)

WELL	N. LATITUDE	W. LONGITUDE
922–30E2AS	40°00'38.972" 40.010826°	109°29'18.121" 109.488367°
922–30D3AS	40°00'39.105" 40.010863°	109°29'18.606" 109.488502°
922–30D3DS	40°00'39.171" 40.010881°	109°29'18.849" 109.488569°
922–30C3S	40°00'38.906" 40.010807°	109°29'17.880" 109.488300°
Existing Well *NBU 78*	40°00'39.039" 40.010844°	109°29'18.364" 109.488434°

Az=87.86806°
N87°52'05"E – 490.99'
(To Bottom Hole)

Az=249.11500°
S69°06'54"W – 252.44'
(To Bottom Hole)

20' 20' 20' 20'

Az=109.47472°
S70°31'31"E

NBU 922–30D3DS
Az. to exist. W.H.=109.47472° 40.0'

NBU 922–30D3AS
Az. to exist. W.H.=109.47472° 20.0'

EXISTING WELL: NBU 78

NBU 922–30E2AS
Az. to exist. W.H.=289.47472° 20.0'

NBU 922–30C3S
Az. to exist. W.H.=289.47472° 40.0'

RELATIVE COORDINATES
From Surface Position to Bottom Hole

WELL	NORTH	EAST
922–30E2AS	–392'	–292'
922–30D3AS	551'	–226'
922–30D3DS	–90'	–236'
922–30C3S	18'	491'

LATITUDE & LONGITUDE
Bottom Hole – (NAD 83)

WELL	N. LATITUDE	W. LONGITUDE
922–30E2AS	40°00'35.100" 40.009750°	109°29'21.871" 109.489409°
922–30D3AS	40°00'44.547" 40.012374°	109°29'21.508" 109.489308°
922–30D3DS	40°00'38.281" 40.010634°	109°29'21.878" 109.489411°
922–30C3S	40°00'39.088" 40.010858°	109°29'11.576" 109.486549°

Az=216.69083°
S36°41'27"W – 488.63'
(To Bottom Hole)

LATITUDE & LONGITUDE
Surface Position – (NAD 27)

WELL	N. LATITUDE	W. LONGITUDE
922–30E2AS	40°00'39.098" 40.010861°	109°29'15.651" 109.487681°
922–30D3AS	40°00'39.232" 40.010898°	109°29'16.136" 109.487816°
922–30D3DS	40°00'39.297" 40.010916°	109°29'16.379" 109.487883°
922–30C3S	40°00'39.033" 40.010842°	109°29'15.410" 109.487614°
Existing Well *NBU 78*	40°00'39.165" 40.010879°	109°29'15.894" 109.487748°

LATITUDE & LONGITUDE
Bottom Hole – (NAD 27)

WELL	N. LATITUDE	W. LONGITUDE
922–30E2AS	40°00'35.226" 40.009785°	109°29'19.401" 109.488723°
922–30D3AS	40°00'44.674" 40.012409°	109°29'19.037" 109.488622°
922–30D3DS	40°00'38.408" 40.010669°	109°29'19.408" 109.488725°
922–30C3S	40°00'39.214" 40.010893°	109°29'09.106" 109.485863°

60' 30' 0' 60'
SCALE

Kerr–McGee
Oil & Gas Onshore, LP
1099 18th Street – Denver, Colorado 80202

NBU 922-30E2AS, NBU 922-30D3AS,
NBU 922-30D3DS, NBU 922-30C3S
LOCATED IN SECTION 30, T9S, R22E,
S.L.B.&M. UINTAH COUNTY, UTAH.

609 CONSULTING, LLC
371 Coffeen Avenue
Sheridan WY 82801
Phone 307-674-0609
Fax 307-674-0182

DATE SURVEYED: 09-10-08	SURVEYED BY: M.S.B.
DATE DRAWN: 09-29-08	DRAWN BY: E.M.S.
	REVISED: 03-11-09

Timberline (435) 789–1365
Engineering & Land Surveying, Inc.
38 WEST 100 NORTH VERNAL, UTAH 84078

SHEET 5 OF 13

’APIWellNo:43047506550000’

EXISTING ACCESS ROAD

A

A'

B

B'

TOPSOIL STOCKPILE

RESERVE PIT
10' DEPTH
SLOPE 2:1

FILL

CUT

EXISTING WELL PAD

EXISTING METER

BOILER

DIESEL TANK

GENERATOR

MUD PUMP 1

MUD PUMP 2

MUD TANK

WATER TANK

SHAKER

30D3DS

30D3AS

EXISTING NBU 78

30E2AS

30C3S

PIPERACKS

PIPETUBS

EXISTING METHANOL TANK

DERRICK STAND

EXISTING TANK AND BERM

EXISTING SEPERATOR

BACKFLOW PIT
10' DEPTH
SLOPE 2:1

RESERVE PIT AND EXCESS CUT STOCKPILE

TOPSOIL STOCKPILE

1 F4.6
2 F9.2
3 F6.8
4 F3.1
5 C7.3
6 C16.1
7 C3.1
8 C7.9
9 C9.4
10 C3.9
A F5.7
B F2.9
C C7.5
D C3.0
E C2.7
F C9.0
G C13.6
H C2.9
X C0.5

160'
170'
100'
10'
250'
20'
140'
110'
60'

4910
4920
4930
4940
4950
4960

WELL PAD NBU 78 QUANTITIES

EXISTING GRADE @ CENTER OF PAD = 4,927.1'
FINISHED GRADE ELEVATION = 4,926.6'
CUT SLOPES = 1.5:1
FILL SLOPES = 1.5:1

TOTAL CUT FOR WELL PAD = 11,086 C.Y.
TOTAL FILL FOR WELL PAD = 10,440 C.Y.
TOPSOIL @ 6" DEPTH = 2,576 C.Y.
EXCESS MATERIAL = 646 C.Y.
TOTAL DISTURBANCE = 3.94 ACRES
SHRINKAGE FACTOR = 1.10
SWELL FACTOR = 1.00
RESERVE PIT CAPACITY (2' OF FREEBOARD)
+/- 25,880 BARRELS
RESERVE PIT VOLUME
+/- 7,185 CY
BACKFLOW PIT CAPACITY (2' OF FREEBOARD)
+/- 8,780 BARRELS
BACKFLOW PIT VOLUME
+/- 2,520 CY

WELL PAD LEGEND

EXISTING WELL LOCATION
PROPOSED WELL LOCATION
EXISTING CONTOURS (2' INTERVAL)
PROPOSED CONTOURS (2' INTERVAL)

HORIZONTAL 0 30 60 1" = 60'
2' CONTOURS

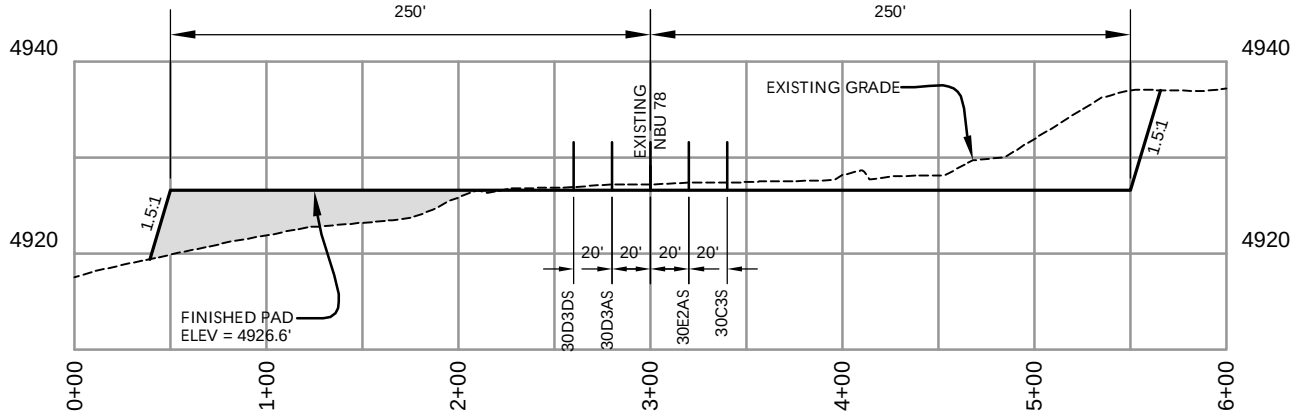
KERR-MCGEE OIL & GAS
ONSHORE L.P.
1099 18th Street - Denver, Colorado 80202

WELL PAD - LOCATION LAYOUT
NBU 922-30E2AS, NBU 922-30D3AS,
NBU 922-30D3DS, NBU 922-30C3S
LOCATED IN SECTION 30, T.9S., R.22E.
S.L.B.&M., UINTAH COUNTY, UTAH

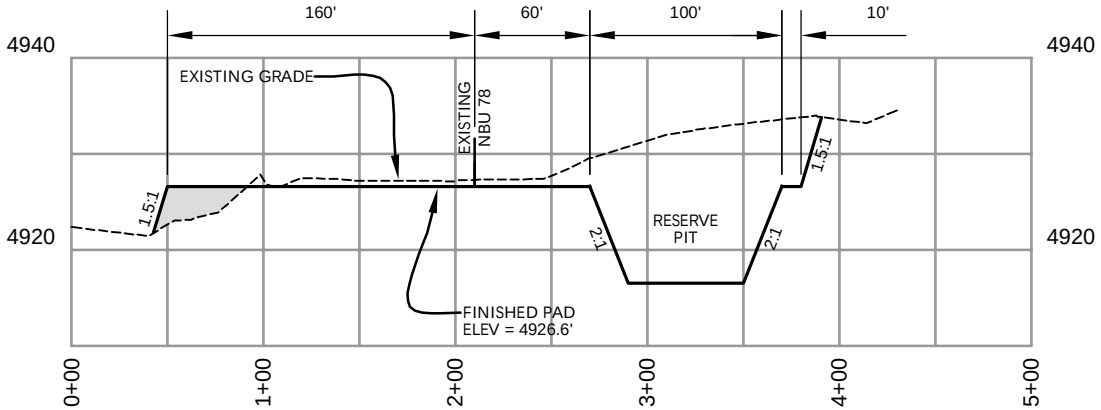
609 CONSULTING, LLC
371 Coffeen Avenue
Sheridan WY 82801
Phone 307-674-0609
Fax 307-674-0182

Scale: 1"=60'	Date: 11/12/08	SHEET NO:
REVISED:	GMH 3/19/09	6 6 OF 13

Timberline Engineering & Land Surveying, Inc.
(435) 789-1365
38 WEST 100 NORTH VERNAL, UTAH 84078



CROSS SECTION A-A'



CROSS SECTION B-B'

NOTE: CROSS SECTION B-B' DEPICTS MAXIMUM RESERVE PIT DEPTH.

KERR-MCGEE OIL & GAS ONSHORE L.P.
1099 18th Street - Denver, Colorado 80202

WELL PAD - CROSS SECTIONS
NBU 922-30E2AS, NBU 922-30D3AS,
NBU 922-30D3DS, NBU 922-30C3S
LOCATED IN SECTION 30, T.9S., R.22E.
S.L.B.&M., UINTAH COUNTY, UTAH

609 CONSULTING, LLC
371 Coffeen Avenue
Sheridan WY 82801
Phone 307-674-0609
Fax 307-674-0182

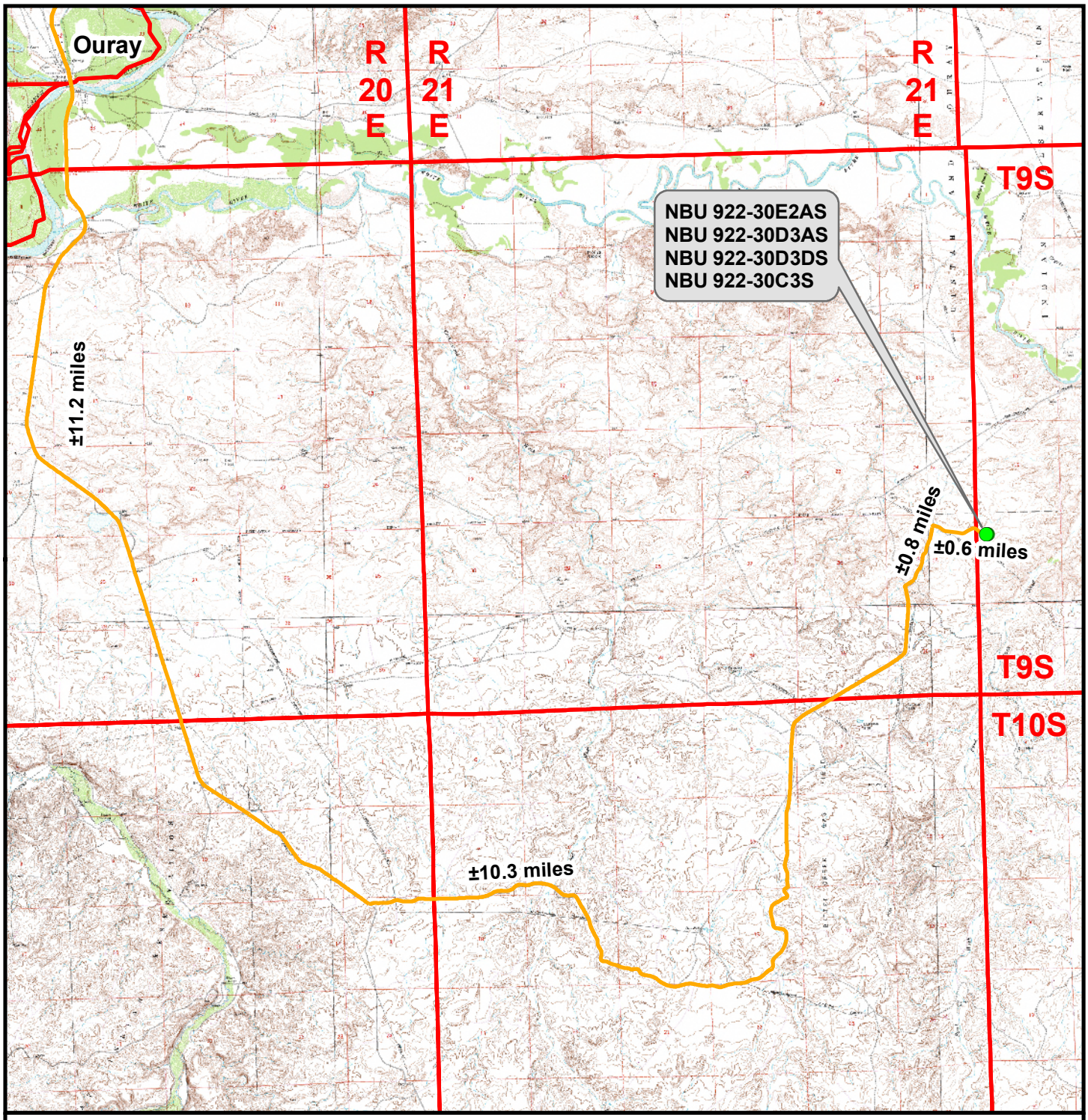
Scale: 1"=100'	Date: 11/12/08	SHEET NO:
REVISED:	GMH 3/19/09	7 OF 13

HORIZONTAL 0 50 100 1" = 100'
VERTICAL 0 10 20 1" = 20'

Timberline Engineering & Land Surveying, Inc.
38 WEST 100 NORTH VERNAL, UTAH 84078 (435) 789-1365

'APIWellNo:43047506550000'

’APIWellNo:43047506550000’



Legend

- Proposed Well Location
- Access Route - Proposed

Kerr-McGee Oil & Gas Onshore, LP
1099 18th Street, Denver, Colorado 80202

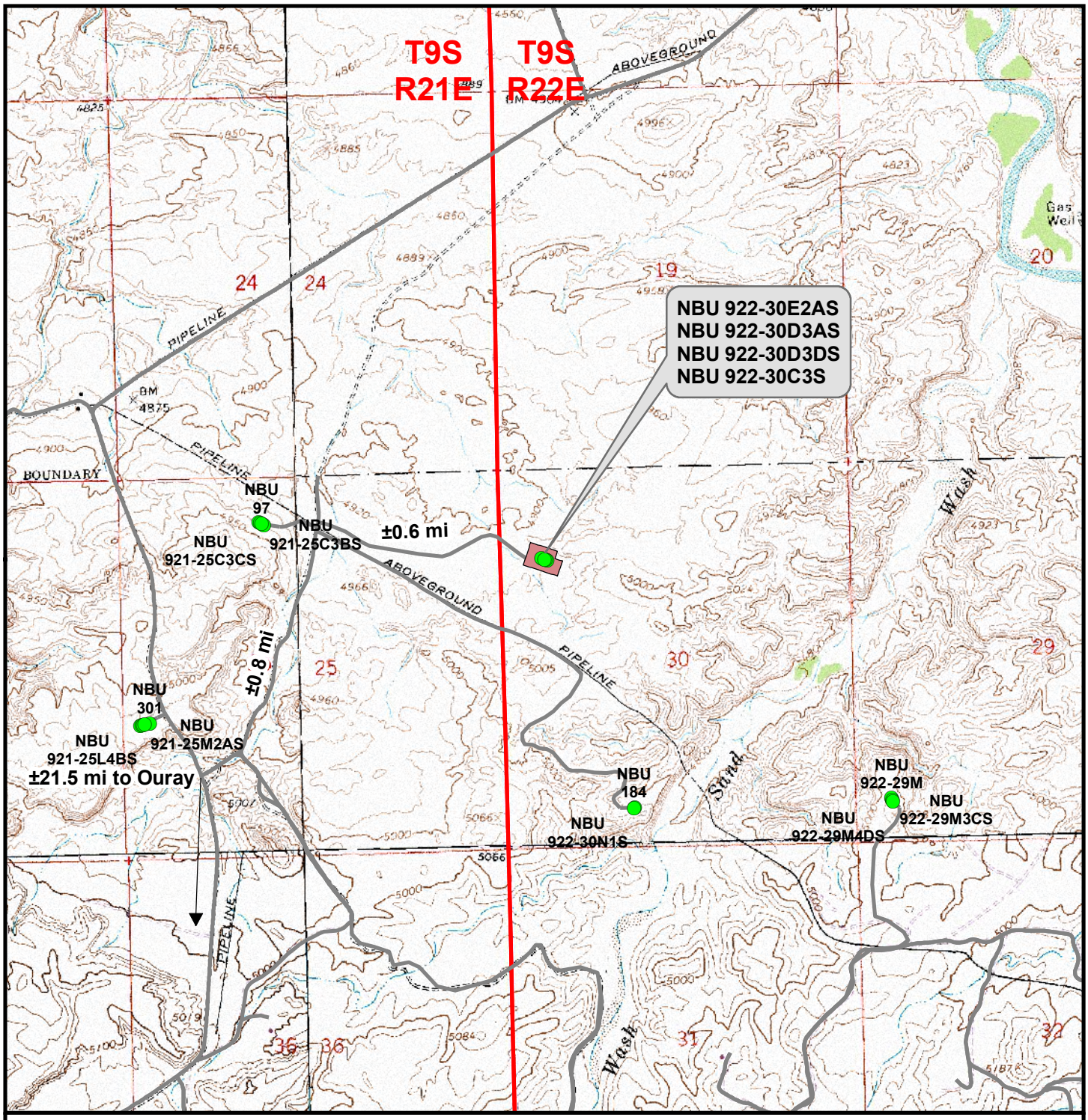
NBU 922-30E2AS, NBU 922-30D3AS, NBU 922-30D3DS & NBU 922-30C3S
Topo A
Located In Section 30, T9S, R22E S.L.B.&M., Uintah County, Utah

609 CONSULTING, LLC
371 Coffeen Avenue
Sheridan, WY 82801
Phone (307) 674-0609
Fax (307) 674-0182

N

Scale: 1:100,000	NAD83 USP Central	Sheet No: 9	9 of 13
Drawn: JELo	Date: 24 Feb 2009		
Revised:	Date:		

’APIWellNo:43047506550000’



Legend

Total Proposed Road Length: ±0ft

Well - Proposed | Well Pad | Road - Proposed | Road - Existing

Kerr-McGee Oil & Gas Onshore, LP
1099 18th Street, Denver, Colorado 80202

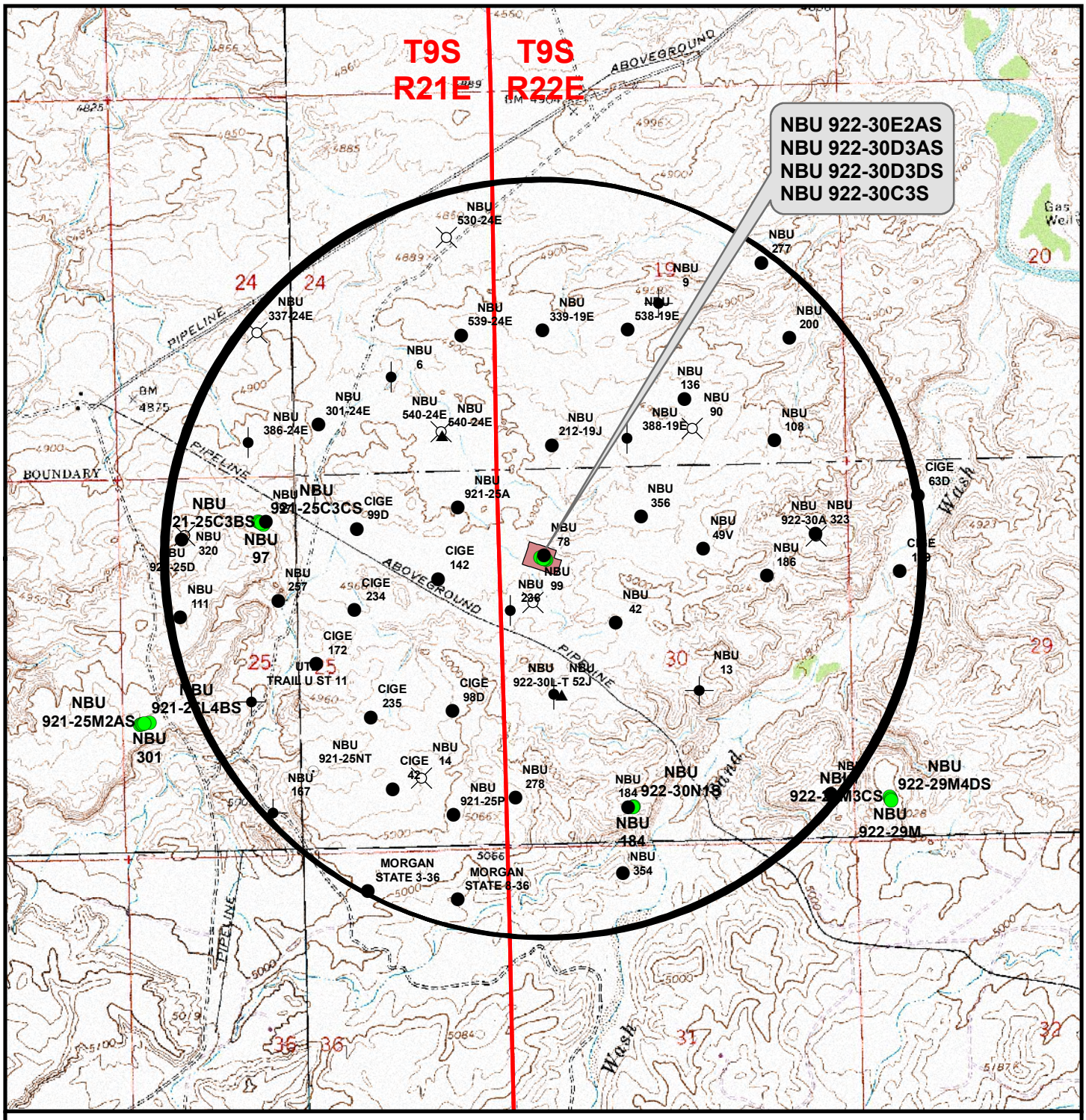
NBU 922-30E2AS, NBU 922-30D3AS, NBU 922-30D3DS & NBU 922-30C3S
Topo B
Located In Section 30, T9S, R22E
S.L.B.&M., Uintah County, Utah

609 CONSULTING, LLC
371 Coffeen Avenue
Sheridan, WY 82801
Phone (307) 674-0609
Fax (307) 674-0182

N

Scale: 1" = 2000ft	NAD83 USP Central	Sheet No: 10	10 of 13
Drawn: JELo	Date: 24 Feb 2009		
Revised:	Date:		

’APIWellNo:43047506550000’



Legend

Well locations derived from State of Utah, Dept. of Natural Resources, Division of Oil, Gas and Mining

- Well - Proposed
- Well - 1 Mile Radius
- Well Pad
- Producing
- Approved permit (APD); not yet spudded
- Spudded (Drilling commenced: Not yet comple
- Location Abandoned
- Temporarily-Abandoned
- Plugged and Abandoned
- Shut-In

Kerr-McGee Oil & Gas Onshore, LP
1099 18th Street, Denver, Colorado 80202

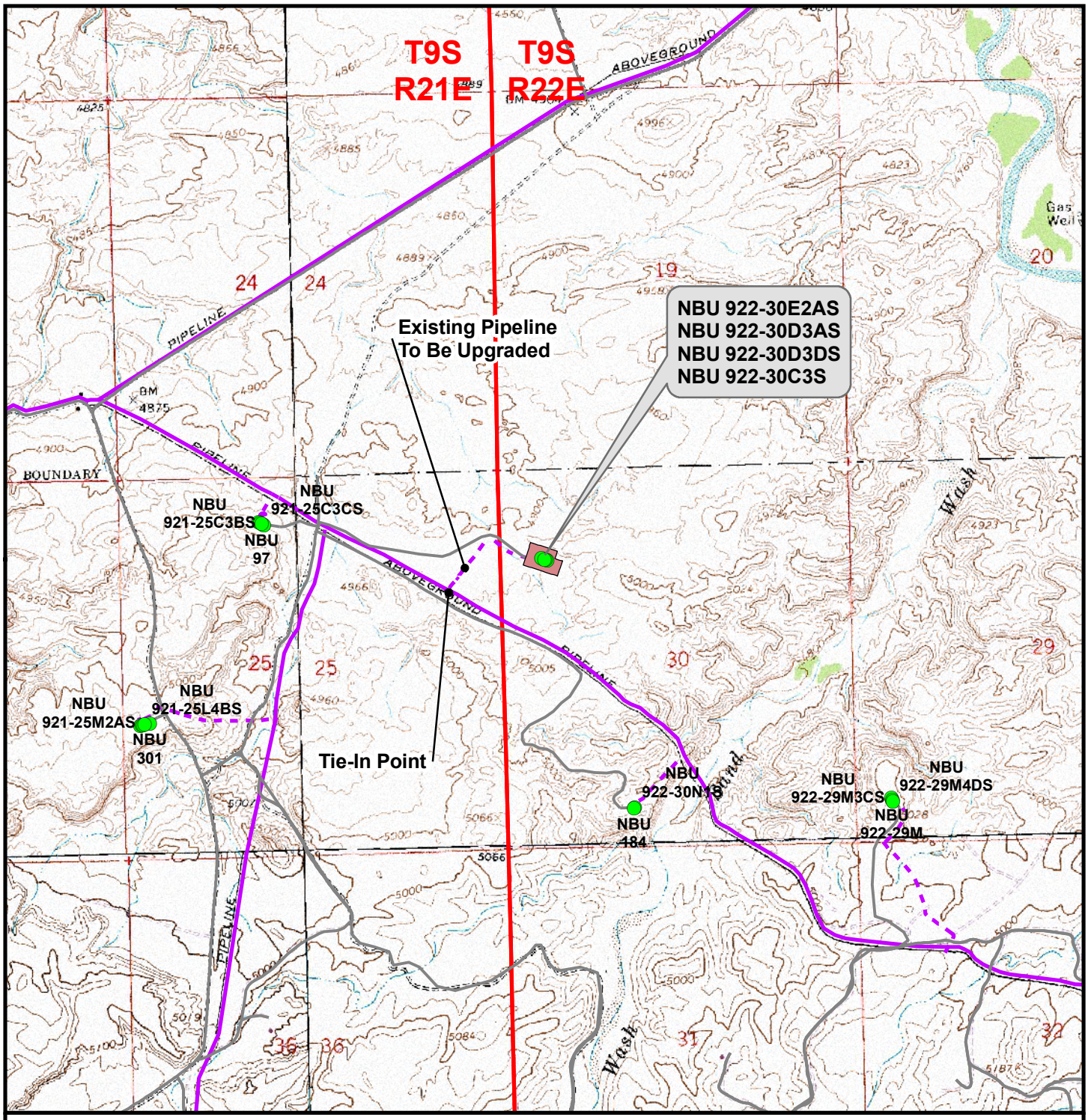
NBU 922-30E2AS, NBU 922-30D3AS, NBU 922-30D3DS & NBU 922-30C3S
Topo C
Located In Section 30, T9S, R22E
S.L.B.&M., Uintah County, Utah

609 CONSULTING, LLC
371 Coffeen Avenue
Sheridan, WY 82801
Phone (307) 674-0609
Fax (307) 674-0182

N

Scale: 1" = 2000ft	NAD83 USP Central	Sheet No: 11 of 13	
Drawn: JELo	Date: 24 Feb 2009		
Revised:	Date:		

’APIWellNo:43047506550000’



Legend

Well - Proposed | Well Pad | Road - Proposed | Pipeline - Proposed | Road - Existing | Pipeline - Existing

Proposed Pipeline Length From Tie-In Point To Edge Of Pad: ±1,705ft
Proposed Pipeline Length Around Pad: ±660ft

Kerr-McGee Oil & Gas Onshore, LP
1099 18th Street, Denver, Colorado 80202

NBU 922-30E2AS, NBU 922-30D3AS, NBU 922-30D3DS & NBU 922-30C3S
Topo D
Located In Section 30, T9S, R22E
S.L.B.&M., Uintah County, Utah

609 CONSULTING, LLC
371 Coffeen Avenue
Sheridan, WY 82801
Phone (307) 674-0609
Fax (307) 674-0182

N

Scale: 1" = 2000ft	NAD83 USP Central	Sheet No: 12 of 13	
Drawn: JELo	Date: 24 Feb 2009		
Revised:	Date:		

'APIWellNo:43047506550000'

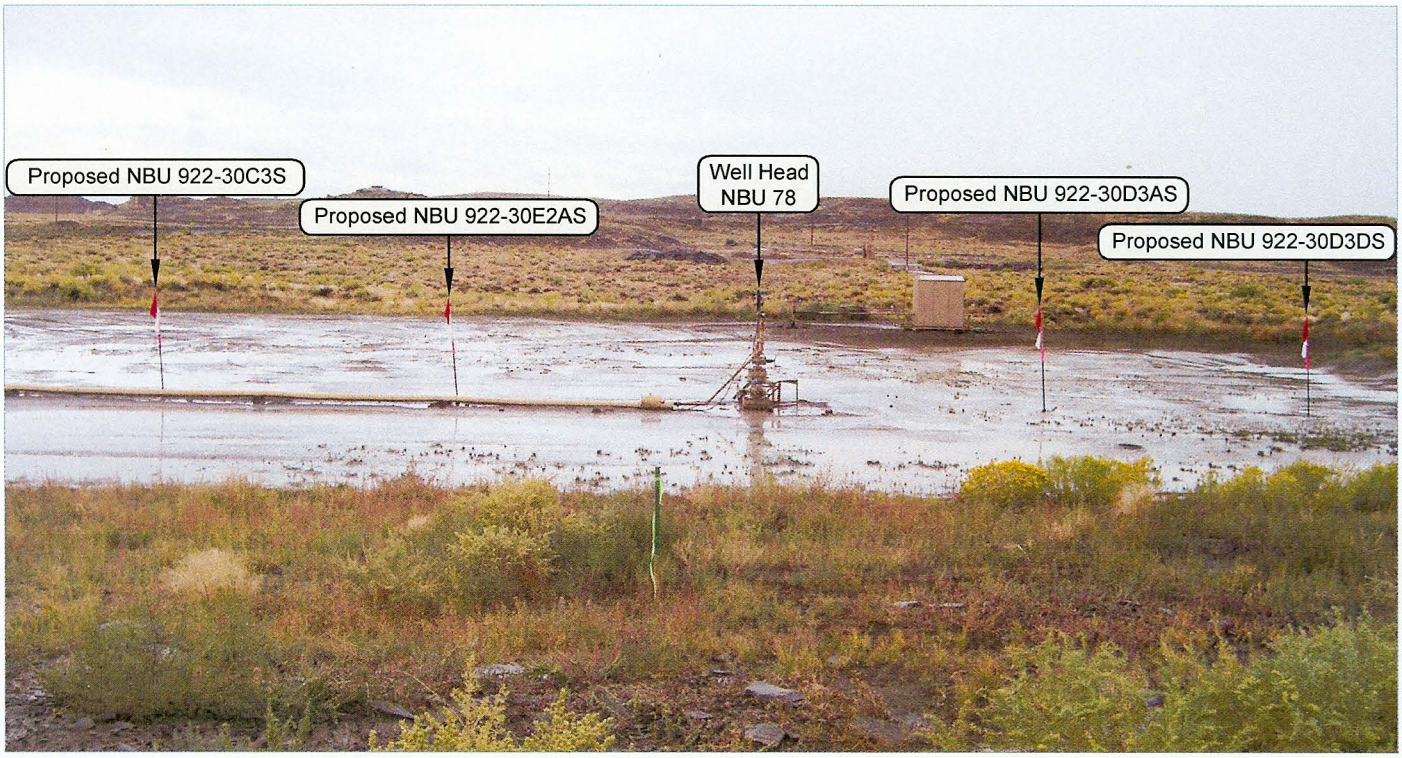


PHOTO VIEW: FROM CORNER D TO LOCATION STAKE

CAMERA ANGLE: SOUTHWESTERLY

PHOTO VIEW: FROM EXISTING ROAD

CAMERA ANGLE: NORTHEASTERLY

Kerr–McGee
Oil & Gas Onshore, LP
1099 18th Street – Denver, Colorado 80202

NBU 922-30E2AS, NBU 922-30D3AS,
NBU 922-30D3DS, NBU 922-30C3S
LOCATED IN SECTION 30, T9S, R22E,
S.L.B.&M. UINTAH COUNTY, UTAH.

CONSULTING, LLC
371 Coffeen Avenue
Sheridan WY 82801
Phone 307-674-0609
Fax 307-674-0182

LOCATION PHOTOS		DATE TAKEN: 09-10-08
		DATE DRAWN: 09-29-08
TAKEN BY: M.S.B.	DRAWN BY: E.M.S.	REVISED: 03-11-09

Timberline Engineering & Land Surveying, Inc.
(435) 789-1365
38 WEST 100 NORTH VERNAL, UTAH 84078

Kerr-McGee Oil & Gas Onshore, LP
NBU 922-30E2AS, NBU 922-30D3AS, NBU 922-30D3DS & NBU 922-30C3S
Section 30, T9S, R22E, S.L.B.&M.

PROCEED IN A WESTERLY DIRECTION FROM VERNAL, UTAH ALONG U.S. HIGHWAY 40 APPROXIMATELY 13.9 MILES TO THE JUNCTION OF STATE HIGHWAY 88. EXIT LEFT AND PROCEED IN A SOUTHERLY DIRECTION ALONG STATE HIGHWAY 88 APPROXIMATELY 16.8 MILES TO OURAY, UTAH. FROM OURAY, PROCEED IN A SOUTHERLY DIRECTION ALONG THE SEEP RIDGE ROAD (COUNTY B ROAD 2810) APPROXIMATELY 11.2 MILES TO THE INTERSECTION OF THE GLEN BENCH ROAD (COUNTY B ROAD 3260). EXIT LEFT AND PROCEED IN AN EASTERLY, THEN SOUTHEASTERLY, THEN NORTHEASTERLY DIRECTION ALONG THE GLEN BENCH ROAD APPROXIMATELY 10.3 MILES TO THE INTERSECTION OF A CLASS D COUNTY ROAD RUNNING IN A NORTH BY NORTHEAST DIRECTION. EXIT RIGHT AND PROCEED IN A NORTH BY NORTHEAST DIRECTION ALONG THE CLASS D ROAD APPROXIMATELY 0.8 MILES TO AN EXISTING SERVICE ROAD TO THE EAST. EXIT RIGHT AND PROCEED IN AN EASTERLY DIRECTION ALONG THE SERVICE ROAD APPROXIMATELY 0.6 MILES TO THE EXISTING WELL PAD.

TOTAL DISTANCE FROM VERNAL, UTAH TO THE PROPOSED WELL LOCATION IS APPROXIMATELY 53.6 MILES IN A SOUTHERLY DIRECTION.

NBU 922-30C3S
Surface: 1,253' FNL 663' FWL (NW/4NW/4) Lot 1
BHL: 1,238' FNL 1,154' FWL (NE/4NW/4)

NBU 922-30D3AS
Surface: 1,232' FNL 607' FWL (NW/4NW/4) Lot 1
BHL: 680' FNL 382' FWL (NW/4NW/4) Lot 1

NBU 922-30D3DS
Surface: 1,226' FNL 588' FWL (NW/4NW/4) Lot 1
BHL: 1,314' FNL 352' FWL (NW/4NW/4) Lot 1

NBU 922-30E2AS
Surface: 1,246' FNL 645' FWL (NW/4NW/4) Lot 1
BHL: 1,636' FNL 352' FWL (SW/4NW/4) Lot 2

Pad: NBU 922-30D
Sec. 30 T9S R22E

Uintah, Utah
Mineral Lease: UTU 0463

ONSHORE ORDER NO. 1

MULTI-POINT SURFACE USE & OPERATIONS PLAN SUBMITTED WITH SITE-SPECIFIC INFORMATION

This Application for Permit to Drill (APD) is filed under the Notice of Staking (NOS) process as stated in Onshore Order No. 1 (OSO #1) and supporting Bureau of Land Management (BLM) documents. An NOS was submitted on March 17, 2009 showing the surface locations in NW/4 NW/4 of Section 30 T9S R22E. At the time the NOS was submitted for the NBU 922-30E2AS, it was known as the NBU 922-30D2S.

This Surface Use Plan of Operations (SUPO) or 13-point plan provides the site-specific information for the above-referenced wells. This information is to be incorporated by reference into the Master Development Plan (MDP) for Kerr-McGee Oil & Gas Onshore LP (Kerr-McGee). The MDP is available upon request from the BLM-Vernal Field Office.

An on-site meeting was held on February 5, 2009. Present were:

- Verlyn Pindell, Dave Gordon and Scott Ackerman – BLM;
- Kolby Kay – 609 Consulting, LLC
- Tony Kazeck, Clay Einerson, Raleen White, Ramey Hoopes, Grizz Oleen, Charles Chase and Spencer Biddle – Kerr-McGee.

Directional Drilling:
In accordance with Utah Oil & Gas Conservation Rule R649-3-11 pertaining to Directional Drilling, this well will be directionally drilled in order to access portions of our lease which are otherwise inaccessible due to topography.

1. Existing Roads:

A) Refer to Topo Map A for directions to the location.

B) Refer to Topo Maps A and B for location of access roads within a 2-mile radius.

2. Planned Access Roads:

See MDP for additional details on road construction.

No new access road is proposed. Please refer to the attached Topo Map B. No pipelines will be crossed with the new construction.

Existence of pipelines; maximum grade; turnouts; major cut and fills, culverts, or bridges; gates, cattle guards, fence cuts, or modifications to existing facilities were determined at the on-site and are typically shown on the attached Exhibits and Topo maps.

3. Location of Existing Wells Within a 1-Mile Radius:

Please refer to Topo Map C.

4. Location of Existing and Proposed Facilities:

See MDP for additional details on Existing and Proposed Facilities.

This pad will expand the existing pad for the NBU 78, which is a producing well according to Utah Division of Oil, Gas and Mining (UDOGM) records.

The following guidelines will apply if the well is productive.

Approximately ±2,365' (±0.45 miles) of pipeline is proposed. The existing pipeline, as shown on Topo D, will be upgraded to accommodate anticipated production from the proposed wells. The upgraded pipeline will follow the same route as the existing pipeline. Pipeline segments will be welded or zaplocked together on disturbed areas in or near the location, whenever possible, and dragged into place.

Per request from the onsite meeting, a water diversion ditch will be installed around the pad.

5. Location and Type of Water Supply:

See MDP for additional details on Location and Type of Water Supply.

Water for drilling purposes will be obtained from one of the following sources:

- Dalbo Inc.'s underground well located in Ouray, Utah, Sec. 32 T4S R3E, Water User Claim number 43-8496, application number 53617.
- Price Water Pumping Inc. Green River and White River, various sources, Water Right Number 49-1659, application number: a35745.

Water will be hauled to location over the roads marked on Maps A and B.

No water well is to be drilled on this lease.

6. Source of Construction Materials:
See MDP for additional details on Source of Construction Materials.

7. Methods of Handling Waste Materials:
See MDP for additional details on Methods of Handling Waste Materials.

Any produced water from the proposed well will be contained in a water tank and will then be hauled by truck to one of the pre-approved disposal sites:

RNI in Sec. 5 T9S R22E
NBU #159 in Sec. 35 T9S R21E
Ace Oilfield in Sec. 2 T6S R20E
MC&MC in Sec. 12 T6S R19E
Pipeline Facility in Sec. 36 T9S R20E
Goat Pasture Evaporation Pond in SW/4 Sec. 16 T10S R22E
Bonanza Evaporation Pond in Sec. 2 T10S R23E

8. Ancillary Facilities:
See MDP for additional details on Ancillary Facilities.

None are anticipated.

9. Well Site Layout: (See Location Layout Diagram)
See MDP for additional details on Well Site Layout.

All pits will be fenced according to the following minimum standards:

- Net wire (39-inch) will be used with at least one strand of barbed wire on top of the net wire. Barbed wire is not necessary if pipe or some type of reinforcement rod is attached to the top of the entire fence.
- The net wire shall be no more than two inches above the ground. The barbed wire shall be three inches over the net wire. Total height of the fence shall be at least 42 inches.
- Corner posts shall be cemented and/or braced in such a manner to keep the fence tight at all times.
- Standard steel, wood, or pipe posts shall be used between the corner braces. Maximum distance between any 2 fence posts shall be no greater than 16 feet.
- All wire shall be stretched, by using a stretching device, before it is attached to corner posts.

10. Plans for Reclamation of the Surface:
See MDP for additional details on Plans for Reclamation of the Surface.

11. Surface/Mineral Ownership:
United States of America
Bureau of Land Management
170 South 500 East
Vernal, UT 84078
(435)781-4400

12. Other Information:

See MDP for additional details on Other Information.

13. Lessee's or Operators' Representative & Certification:

Kathy Schneebeck Dulnoan
Regulatory Analyst
Kerr-McGee Oil & Gas Onshore LP
PO Box 173779
Denver, CO 80217-3779
(720) 929-6007

Tommy Thompson
General Manager, Drilling
Kerr-McGee Oil & Gas Onshore LP
PO Box 173779
Denver, CO 80217-3779
(720) 929-6724

Certification: All lease and/or unit operations will be conducted in such a manner that full compliance is made with all applicable laws, regulations, Onshore Oil and Gas Orders, the approved Plan of Operations, and any applicable Notice to Lessees.

The Operator will be fully responsible for the actions of its subcontractors. A complete copy of the approved "Application for Permit to Drill" will be furnished to the field representative(s) to ensure compliance and shall be on location during all construction and drilling operations.

Kerr-McGee Oil & Gas Onshore LP is considered to be the operator of the subject well. Kerr-McGee Oil & Gas Onshore LP agrees to be responsible under terms and conditions of the lease for the operations conducted upon leased lands.

Bond coverage pursuant to 43 CFR 3104 for lease activities is being provided by Bureau of Land Management Nationwide Bond WYB000291.

I hereby certify that I, or persons under my supervision, have inspected the proposed drill site and access route, that I am familiar with the conditions that currently exist; that I have full knowledge of the State and Federal laws applicable to this operation; that the statements made in this plan are, to the best of my knowledge, true and correct; and the work associated with the operations proposed herein will be performed in conformity with this APD package and the terms and conditions under which it is approved. I also certify that I, or the company I represent, am responsible for operations conducted under this application. These statements are subject to the provisions of 18 U.S.C. 1001 for the filing of false statements.

Kathy Schneebeck Dulnoan

August 13, 2009
Date

Kerr-McGee Oil & Gas Onshore LP
PO Box 173779
Denver, CO 80217-3779

June 9, 2009

Diana Mason
Utah Department of Oil, Gas & Mining
P.O. Box 145801
Salt Lake City, Utah 54114-6100

RE: Directional Drilling Letter R649-3-11
NBU 922-30D3DS
T9S-R22E
Section 30: NW/4NW/4 surface and bottom hole
1226' FNL, 588' FWL (surface)
1314' FNL, 352' FWL (bottom hole)
Uintah County, Utah

Dear Ms. Mason:

Pursuant to the filing of Kerr-McGee Oil & Gas Onshore LP's (Kerr-McGee) Application for Permit to Drill regarding the above referenced well, we are herby submitting this letter in accordance with Oil & Gas Conservation Rule R649-3-11 pertaining to the Exception to Location and Siting of Wells.

- Kerr-McGee's NBU 922-30D3DS is located within the Natural Buttes Unit Area.
- Kerr-McGee is permitting this well as a directional well in order to minimize surface disturbance. Locating the well at the surface location and directionally drilling from this location, Kerr-McGee will be able to utilize the existing road and pipelines in the area.
- Furthermore, Kerr-McGee certifies that it is the sole working interest owner within 460 feet of the entire directional well bore.

Therefore, based on the above stated information Kerr-McGee Oil & Gas Onshore LP requests the permit to be granted pursuant to R649-3-11.

Sincerely,

KERR-MCGEE OIL & GAS ONSHORE LP

Joe Matney
Senior Staff Landman

'APIWellNo:43047506550000'

CLASS I REVIEW OF KERR-MCGEE OIL & GAS ONSHORE LP'S PROPOSED NBU 922-30C3S, 922-30D3AS, 922-30D3DS, AND 922-30E2AS DRILL LOCATIONS TOWNSHIP 9S, RANGE 22E, SECTION 30 UINTAH COUNTY, UTAH

By:

Jacki A. Montgomery

Prepared For:

Bureau of Land Management
Vernal Field Office
and
State of Utah
School & Institutional Trust Lands Administration

Prepared Under Contract With:

Kerr-McGee Oil and Gas Onshore LP
1368 South 1200 East
Vernal, Utah 84078

Prepared By:

Montgomery Archaeological Consultants, Inc.
P.O. Box 219
Moab, Utah 84532

MOAC Report No. 08-280b

August 14, 2009

United States Department of Interior (FLPMA)
Permit No. 09-UT-60122

Public Lands Policy Coordination Office
Archaeological Survey Permit No. 117

IPC #08-280

Paleontological Reconnaissance Survey Report

Survey of Kerr McGee's Proposed Directional Wells and Pipeline for "NBU #922-30E2AS, 30D3AS, 30D3DS & 30C3S" (Sec. 25, T 9 S, R 21 E) & (Sec. 30, T 9 S, R 22 E)

Red Wash SW
Topographic Quadrangle
Uintah County, Utah

December 1, 2008

Prepared by Stephen D. Sandau
Paleontologist for
Intermountain Paleo-Consulting
P. O. Box 1125
Vernal, Utah 84078

’APIWellNo:43047506550000’

Grasslands Consulting, Inc.

4800 Happy Canyon Road, Suite 110, Denver, CO 80237
(303) 759-5377 Office (303) 759-5324 Fax

SPECIAL STATUS PLANT AND WILDLIFE SPECIES REPORT

Report Number: GCI #86

Operator: Kerr-McGee Oil & Gas Onshore LP

Wells: NBU 922-30D pad (Bores: NBU 922-30E2AS, NBU 922-30C3S , NBU 922-30D3AS, NBU 922-30D3DS)

Pipeline: Associated pipeline to proposed well pad

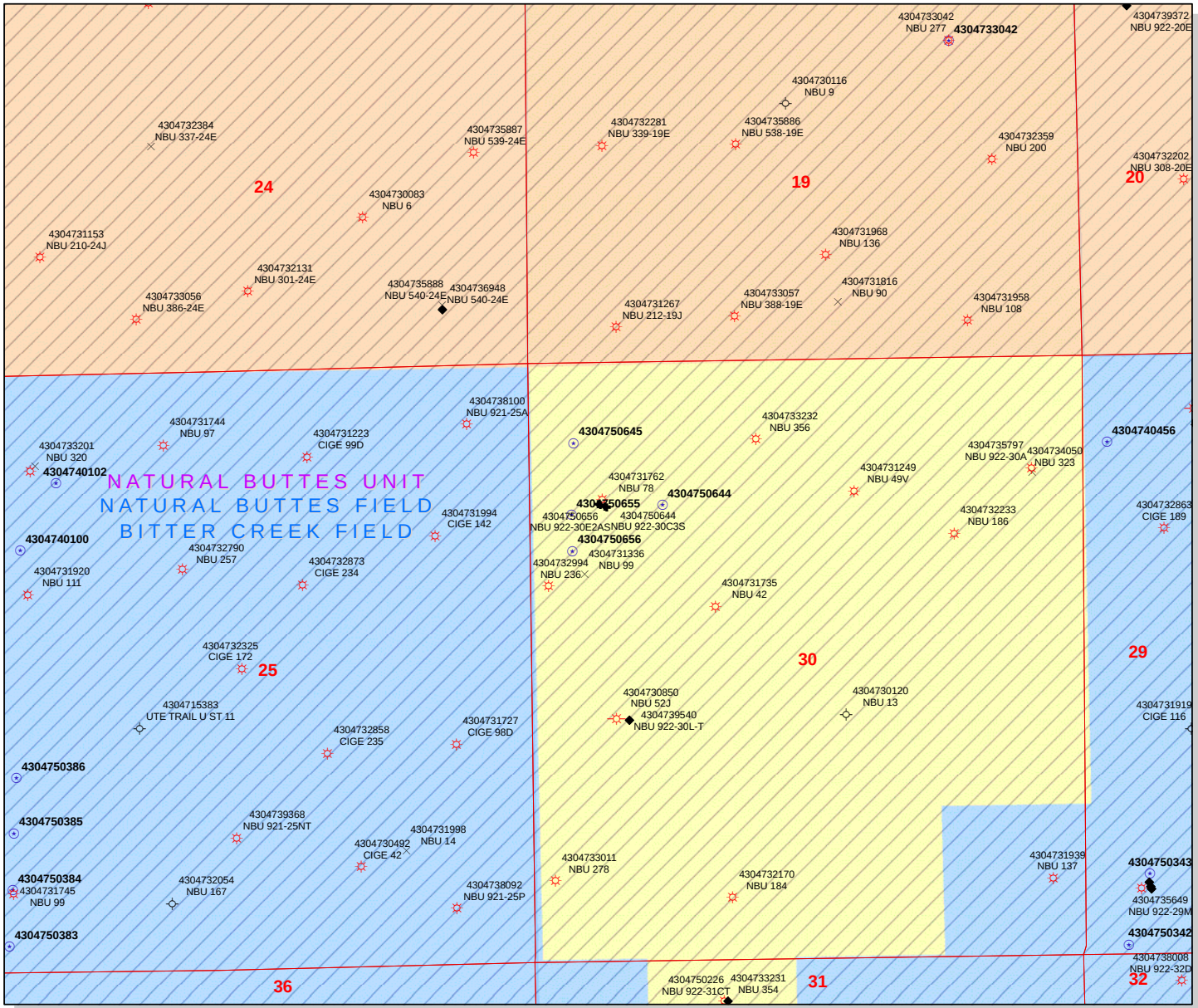
Location: Section 30, Township 9 South, Range 22 East; Uintah County, Utah

Survey-Species: Uinta Basin Hookless Cactus (*Sclerocactus wetlandicus*)

Date: August 6, 2009

Observer(s): Grasslands Consulting, Inc. Biologist: Nick Hall. Technician: Chad Johnson.

Weather: Partly cloudy, 70-90ºF, 0-10 mph winds with slight precipitation.



API Number: 4304750655

Well Name: NBU 922-30D3DS

Township 09.0 S Range 22.0 E Section 30

Meridian: SLBM

Operator: KERR-MCGEE OIL & GAS ONSHORE, L.P.

Map Prepared:
Map Produced by Diana Mason

Units

STATUS
- ACTIVE
- EXPLORATORY
- GAS STORAGE
- NF PP OIL
- NF SECONDARY
- PI OIL
- PP GAS
- PP GEOTHERML
- PP OIL
- SECONDARY
- TERMINATED

Fields

STATUS
- ACTIVE
- COMBINED
- Sections

Wells Query Events
- <all other values>

GIS_STAT_TYPE
- <Null>
- APD
- DRL
- GI
- GS
- LA
- NEW
- OPS
- PA
- PGW
- POW
- RET
- SGW
- SOW
- TA
- TW
- WD
- WI
- WS

1,100 550 0 1,100 Feet

1:10,929

'APIWellNo:43047506550000'

United States Department of the Interior

BUREAU OF LAND MANAGEMENT
Utah State Office
P.O. Box 45155
Salt Lake City, Utah 84145-0155

IN REPLY REFER TO:
3160
(UT-922)

August 28, 2009

Memorandum

To: Assistant District Manager Minerals, Vernal District

From: Michael Coulthard, Petroleum Engineer

Subject: 2009 Plan of Development Natural Buttes Unit Uintah County, Utah.

Pursuant to email between Diana Whitney, Division of Oil, Gas and Mining, and Mickey Coulthard, Utah State Office, Bureau of Land Management, the following wells are planned for calendar year 2009 within the Natural Buttes Unit, Uintah County, Utah.

API #	WELL NAME	LOCATION
(Proposed PZ WASATCH-MESA VERDE)		
43-047-50640	NBU 1022-8B1DS	Sec 08 T10S R22E 0931 FNL 1709 FEL
	BHL	Sec 08 T10S R22E 0367 FNL 1518 FEL
43-047-50641	NBU 1022-8B4AS	Sec 08 T10S R22E 0919 FNL 1693 FEL
	BHL	Sec 08 T10S R22E 0744 FNL 1518 FEL
43-047-50642	NBU 1022-8C1AS	Sec 08 T10S R22E 0943 FNL 1725 FEL
	BHL	Sec 08 T10S R22E 0102 FNL 2415 FWL
43-047-50643	NBU 1022-8C1CS	Sec 08 T10S R22E 0955 FNL 1742 FEL
	BHL	Sec 08 T10S R22E 0418 FNL 2252 FWL
43-047-50644	NBU 922-30C3S	Sec 30 T09S R22E 1253 FNL 0663 FWL
	BHL	Sec 30 T09S R22E 1238 FNL 1154 FWL
43-047-50645	NBU 922-30D3AS	Sec 30 T09S R22E 1232 FNL 0607 FWL
	BHL	Sec 30 T09S R22E 0680 FNL 0382 FWL
43-047-50646	NBU 921-30C3CS	Sec 30 T09S R21E 0783 FNL 0920 FWL
	BHL	Sec 30 T09S R21E 0993 FNL 1985 FWL
43-047-50647	NBU 921-30D2DS	Sec 30 T09S R21E 0747 FNL 0871 FWL
	BHL	Sec 30 T09S R21E 0460 FNL 0665 FWL

API #	WELL NAME	LOCATION

(Proposed PZ WASATCH-MESA VERDE)

43-047-50648 NBU 921-30D3DS Sec 30 T09S R21E 0759 FNL 0887 FWL
BHL Sec 30 T09S R21E 1152 FNL 0665 FWL

43-047-50649 NBU 921-30E2AS Sec 30 T09S R21E 0771 FNL 0903 FWL
BHL Sec 30 T09S R21E 1522 FNL 0665 FWL

43-047-50650 NBU 1022-7N1S Sec 07 T10S R22E 0089 FSL 1920 FEL
BHL Sec 07 T10S R22E 0895 FSL 1870 FWL

43-047-50651 NBU 1022-7N4S Sec 07 T10S R22E 0097 FSL 1938 FEL
BHL Sec 07 T10S R22E 0595 FSL 1740 FWL

43-047-50652 NBU 1022-7O4AS Sec 07 T10S R22E 0081 FSL 1902 FEL
BHL Sec 07 T10S R22E 0550 FSL 1560 FEL

43-047-50653 NBU 1022-7O4DS Sec 07 T10S R22E 0074 FSL 1883 FEL
BHL Sec 07 T10S R22E 0230 FSL 1650 FEL

43-047-50655 NBU 922-30D3DS Sec 30 T09S R22E 1226 FNL 0588 FWL
BHL Sec 30 T09S R22E 1314 FNL 0352 FWL

43-047-50656 NBU 922-30E2AS Sec 30 T09S R22E 1246 FNL 0645 FWL
BHL Sec 30 T09S R22E 1636 FNL 0352 FWL

43-047-50678 NBU 922-31G4BS Sec 31 T09S R22E 2317 FSL 0188 FEL
BHL Sec 31 T09S R22E 1994 FNL 1808 FEL

43-047-50679 NBU 922-31G4CS Sec 31 T09S R22E 2316 FSL 0198 FEL
BHL Sec 31 T09S R22E 2353 FNL 1796 FEL

43-047-50680 NBU 922-31I1AS Sec 31 T09S R22E 2317 FSL 0178 FEL
BHL Sec 31 T09S R22E 2483 FSL 0243 FEL

43-047-50681 NBU 922-31I1DS Sec 31 T09S R22E 2317 FSL 0168 FEL
BHL Sec 31 T09S R22E 2137 FSL 0264 FEL

43-047-50682 NBU 921-12J Sec 12 T09S R21E 1959 FSL 2051 FEL

43-047-50684 NBU 1022-6I3AS Sec 06 T10S R22E 1160 FSL 1584 FEL
BHL Sec 06 T10S R22E 1684 FSL 1167 FEL

43-047-50685 NBU 1022-6J4CS Sec 06 T10S R22E 1178 FSL 1593 FEL
BHL Sec 06 T10S R22E 1535 FSL 1760 FEL

43-047-50686 NBU 1022-6O1BS Sec 06 T10S R22E 1124 FSL 1567 FEL
BHL Sec 06 T10S R22E 1197 FSL 1811 FEL

API #	WELL NAME	LOCATION
(Proposed PZ WASATCH-MESA VERDE)		
43-047-50687	NBU 1022-6P1CS	Sec 06 T10S R22E 1142 FSL 1575 FEL BHL Sec 06 T10S R22E 0989 FSL 0541 FEL
43-047-50691	NBU 921-29A3AS	Sec 29 T09S R21E 0299 FNL 2630 FEL BHL Sec 29 T09S R21E 0700 FNL 0885 FEL
43-047-50692	NBU 921-29A3DS	Sec 29 T09S R21E 0303 FNL 2628 FWL BHL Sec 29 T09S R21E 1193 FNL 0885 FEL
43-047-50694	NBU 921-29A2AS	Sec 29 T09S R21E 0296 FNL 2611 FEL BHL Sec 29 T09S R21E 0209 FNL 0885 FEL
43-047-50693	NBU 921-29B2CS	Sec 29 T09S R21E 0307 FNL 2608 FWL BHL Sec 29 T09S R21E 0443 FNL 2635 FEL
43-047-50695	NBU 921-12N	Sec 12 T09S R21E 0441 FSL 2236 FWL
43-047-50698	NBU 921-19F	Sec 19 T09S R21E 2236 FNL 2285 FWL
43-047-50699	NBU 921-17C	Sec 17 T09S R21E 0656 FNL 2004 FWL
43-047-50700	NBU 921-17D	Sec 17 T09S R21E 0985 FNL 0418 FWL
43-047-50701	NBU 921-17G	Sec 17 T09S R21E 1500 FNL 2262 FEL
43-047-50702	NBU 921-17H	Sec 17 T09S R21E 2100 FNL 0553 FEL
43-047-50703	NBU 921-18P	Sec 18 T09S R21E 1080 FSL 0197 FEL
43-047-50704	NBU 921-19E	Sec 19 T09S R21E 2061 FNL 0842 FWL

This office has no objection to permitting the wells at this time.

/s/ Michael L. Coulthard

bcc: File – Natural Buttes Unit
Division of Oil Gas and Mining
Central Files
Agr. Sec. Chron

API Well No: 43047506550000

Fluid Chron

MCoulthard:mc:8-28-09

WORKSHEET
APPLICATION FOR PERMIT TO DRILL

APD RECEIVED: 8/17/2009 **API NO. ASSIGNED:** 43047506550000

WELL NAME: NBU 922-30D3DS

OPERATOR: KERR-MCGEE OIL & GAS ONSHORE, L.P. (N2995) **PHONE NUMBER:** 720 929-6156

CONTACT: Danielle Piernot

PROPOSED LOCATION: NWNW 30 090S 220E **Permit Tech Review:** ☑

SURFACE: 1226 FNL 0588 FWL **Engineering Review:** ☑

BOTTOM: 1314 FNL 0352 FWL **Geology Review:** ☑

COUNTY: UINTAH

LATITUDE: 40.01091 **LONGITUDE:** -109.48785

UTM SURF EASTINGS: 629062.00 **NORTHINGS:** 4429853.00

FIELD NAME: NATURAL BUTTES

LEASE TYPE: 1 - Federal

LEASE NUMBER: UTU 0463 **PROPOSED PRODUCING FORMATION(S):** WASATCH-MESA VERDE

SURFACE OWNER: 1 - Federal **COALBED METHANE:** NO

RECEIVED AND/OR REVIEWED:

- ☑ **PLAT**
- ☑ **Bond:** FEDERAL - WYB000291
- ☐ **Potash**
- ☑ **Oil Shale 190-5**
- ☐ **Oil Shale 190-3**
- ☐ **Oil Shale 190-13**
- ☑ **Water Permit:** Permit #43-8496
- ☐ **RDCC Review:**
- ☐ **Fee Surface Agreement**
- ☑ **Intent to Commingle**

Commingling Approved

LOCATION AND SITING:

- ☐ **R649-2-3.**

Unit: NATURAL BUTTES

- ☐ **R649-3-2. General**
- ☐ **R649-3-3. Exception**
- ☑ **Drilling Unit**

Board Cause No: Cause 173-14

Effective Date: 12/2/1999

Siting: 460' fr u bdry & uncomm. tract

- ☑ **R649-3-11. Directional Drill**

Comments: Presite Completed

Stipulations:
3 - Commingling - ddoucet
4 - Federal Approval - dmason
15 - Directional - dmason
17 - Oil Shale 190-5(b) - dmason

GARY R. HERBERT
Governor
GREGORY S. BELL
Lieutenant Governor

State of Utah
DEPARTMENT OF NATURAL RESOURCES
MICHAEL R. STYLER
Executive Director
Division of Oil, Gas and Mining
JOHN R. BAZA
Division Director

Permit To Drill

****

Well Name: NBU 922-30D3DS
API Well Number: 43047506550000
Lease Number: UTU 0463
Surface Owner: FEDERAL
Approval Date: 10/20/2009

Issued to:
KERR-MCGEE OIL & GAS ONSHORE, L.P., P.O. Box 173779, Denver, CO 80217

Authority:
Pursuant to Utah Code Ann. §40-6-1 et seq., and Utah Administrative Code R649-3-1 et seq., the Utah Division of Oil, Gas and Mining issues conditions of approval, and permit to drill the listed well. This permit is issued in accordance with the requirements of Cause 173-14. The expected producing formation or pool is the WASATCH-MESA VERDE Formation(s), completion into any other zones will require filing a Sundry Notice (Form 9). Completion and commingling of more than one pool will require approval in accordance with R649-3-22.

Duration:
This approval shall expire one year from the above date unless substantial and continuous operation is underway, or a request for extension is made prior to the expiration date

Commingle:
In accordance with Board Cause No. 173-14 commingling of the production from the Wasatch formation and the Mesaverde formation in this well is allowed.

General:
Compliance with the requirements of Utah Admin. R. 649-1 et seq., the Oil and Gas Conservation General Rules, and the applicable terms and provisions of the approved Application for permit to drill.

Conditions of Approval:
State approval of this well does not supercede the required federal approval, which must be obtained prior to drilling.

In accordance with Utah Admin. R.649-3-11, Directional Drilling, the operator shall submit a complete angular deviation and directional survey report to the Division within 30 days following completion of the well.

In accordance with the Order in Cause No. 190-5(b) dated October 28, 1982, the operator shall comply with the requirements of Rules R649-3-31 and R649-3-27 pertaining to Designated Oil Shale Areas. Additionally, the operators shall ensure that the surface and or production casing is properly cemented over the entire oil shale section as defined by Rule R649-3-31. The Operator shall report the actual depth the oil shale is encountered to the division.

API Well No: 43047506550000

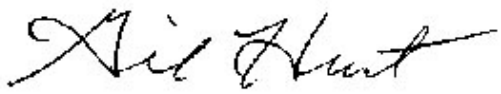
Notification Requirements:
The operator is required to notify the Division of Oil, Gas and Mining of the following actions during drilling of this well:

- Within 24 hours following the spudding of the well – contact Carol Daniels at 801-538-5284 (please leave a voicemail message if not available)
  OR
  submit an electronic sundry notice (pre-registration required) via the Utah Oil & Gas website at https://oilgas.ogm.utah.gov

Reporting Requirements:
All reports, forms and submittals as required by the Utah Oil and Gas Conservation General Rules will be promptly filed with the Division of Oil, Gas and Mining, including but not limited to:

- Entity Action Form (Form 6) – due within 5 days of spudding the well
- Monthly Status Report (Form 9) – due by 5th day of the following calendar month
- Requests to Change Plans (Form 9) – due prior to implementation
- Written Notice of Emergency Changes (Form 9) – due within 5 days
- Notice of Operations Suspension or Resumption (Form 9) – due prior to implementation
- Report of Water Encountered (Form 7) – due within 30 days after completion
- Well Completion Report (Form 8) – due within 30 days after completion or plugging

Approved By:



Gil Hunt
Associate Director, Oil & Gas

API Well No: 43047506550000

STATE OF UTAH
DEPARTMENT OF NATURAL RESOURCES
DIVISION OF OIL, GAS, AND MINING

FORM 9

SUNDRY NOTICES AND REPORTS ON WELLS

Do not use this form for proposals to drill new wells, significantly deepen existing wells below current bottom-hole depth, reenter plugged wells, or to drill horizontal laterals. Use APPLICATION FOR PERMIT TO DRILL form for such proposals.

5.LEASE DESIGNATION AND SERIAL NUMBER: UTU 0463

6. IF INDIAN, ALLOTTEE OR TRIBE NAME:

7.UNIT or CA AGREEMENT NAME: NATURAL BUTTES

1. TYPE OF WELL Gas Well

8. WELL NAME and NUMBER: NBU 922-30D3DS

2. NAME OF OPERATOR: KERR-MCGEE OIL & GAS ONSHORE, L.P.

9. API NUMBER: 43047506550000

3. ADDRESS OF OPERATOR: P.O. Box 173779 1099 18th Street, Suite 600, Denver, CO, 80217 3779 **PHONE NUMBER:** 720 929-6007 Ext

9. FIELD and POOL or WILDCAT: NATURAL BUTTES

4. LOCATION OF WELL
FOOTAGES AT SURFACE: 1226 FNL 0588 FWL
QTR/QTR, SECTION, TOWNSHIP, RANGE, MERIDIAN: Qtr/Qtr: NWNW Section: 30 Township: 09.0S Range: 22.0E Meridian: S

COUNTY: UINTAH

STATE: UTAH

11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION		
✓ NOTICE OF INTENT Approximate date work will start: 10/20/2010	☐ ACIDIZE	☐ ALTER CASING	☐ CASING REPAIR
☐ SUBSEQUENT REPORT Date of Work Completion:	☐ CHANGE TO PREVIOUS PLANS	☐ CHANGE TUBING	☐ CHANGE WELL NAME
	☐ CHANGE WELL STATUS	☐ COMMINGLE PRODUCING FORMATIONS	☐ CONVERT WELL TYPE
☐ SPUD REPORT Date of Spud:	☐ DEEPEN	☐ FRACTURE TREAT	☐ NEW CONSTRUCTION
	☐ OPERATOR CHANGE	☐ PLUG AND ABANDON	☐ PLUG BACK
☐ DRILLING REPORT Report Date:	☐ PRODUCTION START OR RESUME	☐ RECLAMATION OF WELL SITE	☐ RECOMPLETE DIFFERENT FORMATION
	☐ REPERFORATE CURRENT FORMATION	☐ SIDETRACK TO REPAIR WELL	☐ TEMPORARY ABANDON
	☐ TUBING REPAIR	☐ VENT OR FLARE	☐ WATER DISPOSAL
	☐ WATER SHUTOFF	☐ SI TA STATUS EXTENSION	✓ APD EXTENSION
	☐ WILDCAT WELL DETERMINATION	☐ OTHER	OTHER:

12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.

Kerr-McGee Oil & Gas Onshore, L.P. (Kerr-McGee) respectfully requests an extension to this APD for the maximum time allowed. Please contact the undersigned with any questions and/or comments. Thank you.

Approved by the Utah Division of Oil, Gas and Mining

Date: October 25, 2010

By:

NAME (PLEASE PRINT)	PHONE NUMBER	TITLE
Danielle Piernot	720 929-6156	Regulatory Analyst
SIGNATURE N/A		**DATE** 10/19/2010

RECEIVED October 19, 2010

The Utah Division of Oil, Gas, and Mining

- State of Utah
- Department of Natural Resources

Electronic Permitting System - Sundry Notices

Request for Permit Extension Validation Well Number 43047506550000

API: 43047506550000
Well Name: NBU 922-30D3DS
Location: 1226 FNL 0588 FWL QTR NWNW SEC 30 TWNP 090S RNG 220E MER S
Company Permit Issued to: KERR-MCGEE OIL & GAS ONSHORE, L.P.
Date Original Permit Issued: 10/20/2009

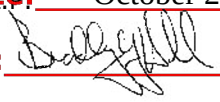
The undersigned as owner with legal rights to drill on the property as permitted above, hereby verifies that the information as submitted in the previously approved application to drill, remains valid and does not require revision. Following is a checklist of some items related to the application, which should be verified.

- **If located on private land, has the ownership changed, if so, has the surface agreement been updated?** ○ **Yes** ◉ **No**
- **Have any wells been drilled in the vicinity of the proposed well which would affect the spacing or siting requirements for this location?** ○ **Yes** ◉ **No**
- **Has there been any unit or other agreements put in place that could affect the permitting or operation of this proposed well?** ○ **Yes** ◉ **No**
- **Have there been any changes to the access route including ownership, or rightof- way, which could affect the proposed location?** ○ **Yes** ◉ **No**
- **Has the approved source of water for drilling changed?** ○ **Yes** ◉ **No**
- **Have there been any physical changes to the surface location or access route which will require a change in plans from what was discussed at the onsite evaluation?** ○ **Yes** ◉ **No**
- **Is bonding still in place, which covers this proposed well?** ◉ **Yes** ○ **No**

Approved by the Utah Division of Oil, Gas and Mining

Signature: Danielle Piernot **Date:** 10/19/2010
Title: Regulatory Analyst **Representing:** KERR-MCGEE OIL & GAS ONSHORE, L.P.

Date: October 25, 2010

By: 

RECEIVED October 19, 2010

Federal Approval of this Action is Necessary

FORM 9

STATE OF UTAH
DEPARTMENT OF NATURAL RESOURCES
DIVISION OF OIL, GAS, AND MINING

5.LEASE DESIGNATION AND SERIAL NUMBER:
UTU 0463

SUNDRY NOTICES AND REPORTS ON WELLS

Do not use this form for proposals to drill new wells, significantly deepen existing wells below current bottom-hole depth, reenter plugged wells, or to drill horizontal laterals. Use APPLICATION FOR PERMIT TO DRILL form for such proposals.

6. IF INDIAN, ALLOTTEE OR TRIBE NAME:

7.UNIT or CA AGREEMENT NAME:
NATURAL BUTTES

1. TYPE OF WELL
Gas Well

8. WELL NAME and NUMBER:
NBU 922-30D3DS

2. NAME OF OPERATOR:
KERR-MCGEE OIL & GAS ONSHORE, L.P.

9. API NUMBER:
43047506550000

3. ADDRESS OF OPERATOR:
P.O. Box 173779 1099 18th Street, Suite 600, Denver, CO, 80217 3779

PHONE NUMBER:
720 929-6515 Ext

9. FIELD and POOL or WILDCAT:
NATURAL BUTTES

4. LOCATION OF WELL
FOOTAGES AT SURFACE:
1226 FNL 0588 FWL
QTR/QTR, SECTION, TOWNSHIP, RANGE, MERIDIAN:
Qtr/Qtr: NWNW Section: 30 Township: 09.0S Range: 22.0E Meridian: S

COUNTY:
UINTAH

STATE:
UTAH

11.
CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION		
✓ NOTICE OF INTENT Approximate date work will start: 5/16/2011	☐ ACIDIZE	☐ ALTER CASING	☐ CASING REPAIR
	✓ CHANGE TO PREVIOUS PLANS	☐ CHANGE TUBING	☐ CHANGE WELL NAME
☐ SUBSEQUENT REPORT Date of Work Completion:	☐ CHANGE WELL STATUS	☐ COMMINGLE PRODUCING FORMATIONS	☐ CONVERT WELL TYPE
	☐ DEEPEN	☐ FRACTURE TREAT	☐ NEW CONSTRUCTION
	☐ OPERATOR CHANGE	☐ PLUG AND ABANDON	☐ PLUG BACK
☐ SPUD REPORT Date of Spud:	☐ PRODUCTION START OR RESUME	☐ RECLAMATION OF WELL SITE	☐ RECOMPLETE DIFFERENT FORMATION
	☐ REPERFORATE CURRENT FORMATION	☐ SIDETRACK TO REPAIR WELL	☐ TEMPORARY ABANDON
	☐ TUBING REPAIR	☐ VENT OR FLARE	☐ WATER DISPOSAL
☐ DRILLING REPORT Report Date:	☐ WATER SHUTOFF	☐ SI TA STATUS EXTENSION	☐ APD EXTENSION
	☐ WILDCAT WELL DETERMINATION	☐ OTHER	OTHER:

12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.

The above captioned well location was originally approved on 10/20/2009. Kerr-McGee Oil & Gas, L.P. (Kerr-McGee) has revised the Survey Plats, the Drilling Program, the Directional Drilling Plan and the Surface Use Plan of Operations. Please see the attachment reflecting these changes. Thank you.

Accepted by the Utah Division of Oil, Gas and Mining

Date: 07/05/2011

By: Dark K Quist

NAME (PLEASE PRINT)	PHONE NUMBER	TITLE
Laura Abrams	720 929-6356	Regulatory Analyst II
SIGNATURE		**DATE**
N/A		6/15/2011

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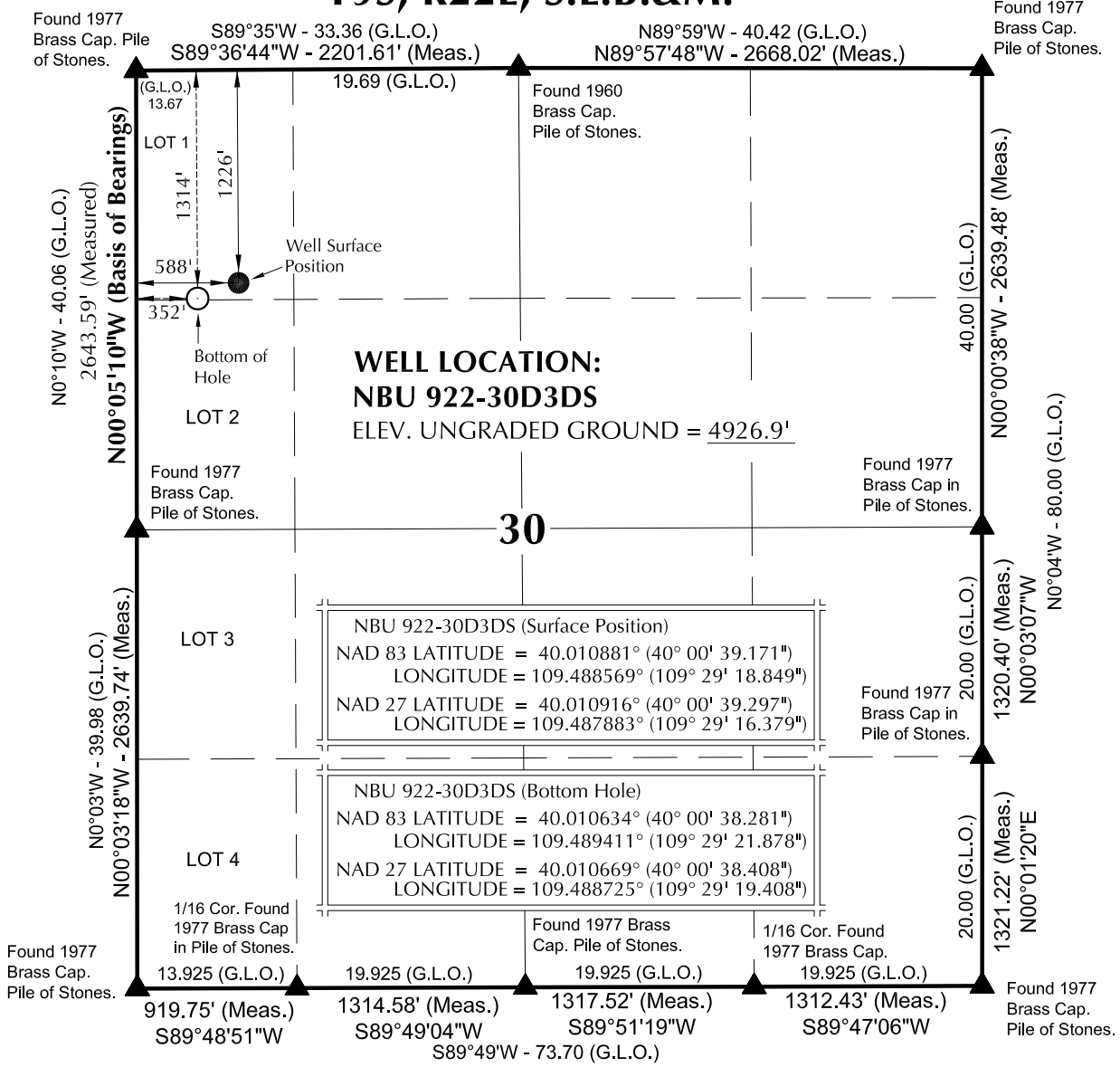
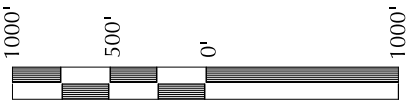
T9S, R22E, S.L.B.&M.



NOTES:

▲ = Section Corners Located

1. Well footages are measured at right angles to the Section Lines.
2. G.L.O. distances are shown in feet or chains. 1 chain = 66 feet.
3. The Bottom of hole bears S69°06'54"W 252.44' from the Surface Position.
4. Bearings are based on Global Positioning Satellite observations.
5. Basis of elevation is Tri-Sta "Two Water" located in the NW ¼ of Section 1, T10S, R21E, S.L.B.&M. The elevation of this Tri-Sta is shown on the Big Pack Mtn NE 7.5 Min. Quadrangle as being 5238'.



SCALE

SURVEYOR'S CERTIFICATE

THIS IS TO CERTIFY THAT THE ABOVE PLAT WAS PREPARED FROM FIELD NOTES OF ACTUAL SURVEYS MADE BY ME OR UNDER MY SUPERVISION AND THAT THE SAME ARE TRUE AND CORRECT TO THE BEST OF MY KNOWLEDGE AND BELIEF.

PROFESSIONAL LAND SURVEYOR No.6028691 JOHN R SLAUGH STATE OF UTAH

PROFESSIONAL LAND SURVEYOR
REGISTRATION No. 6028691
STATE OF UTAH

Kerr-McGee Oil & Gas Onshore, LP
1099 18th Street - Denver, Colorado 80202

WELL PAD: NBU 922-30D

NBU 922-30D3DS
WELL PLAT
1314' FNL, 352' FWL (Bottom Hole)
LOT 1 OF SECTION 30, T9S, R22E,
S.L.B.&M., UINTAH COUNTY, UTAH.

609 CONSULTING, LLC
2155 North Main Street
Sheridan WY 82801
Phone 307-674-0609
Fax 307-674-0182

TIMBERLINE (435) 789-1365
ENGINEERING & LAND SURVEYING, INC.
209 NORTH 300 WEST - VERNAL, UTAH 84078

DATE SURVEYED: 10-13-10	SURVEYED BY: M.S.B.	SHEET NO: 7
DATE DRAWN: 10-15-10	DRAWN BY: E.M.S.	7 OF 19
SCALE: 1" = 1000'	Date Last Revised:	

RECEIVED Jun. 15, 2011

PLEASE NOTE: LOCATIONS OF PROPOSED PIPELINES DISPLAYED WITHIN THE PAD AREA ARE FOR VISUALIZATION PURPOSES ONLY. ACTUAL LOCATIONS TO BE DETERMINED DURING CONSTRUCTION.

8" GAS LINE
6" (MAX.) LIQUID LINE

RESERVE PIT &
EXCESS CUT
STOCKPILE

EXISTING
ACCESS ROAD

CONSTRUCT LWC
(AS NEEDED)

RESERVE PIT
12' DEPTH
SLOPE 1.5:1

RECLAIMED
PIT

TOPSOIL
STOCKPILE

RESERVE PIT &
EXCESS CUT
STOCKPILE

EXISTING METER

NBU 922-30D3DS
NBU 922-30D3AS
NBU 922-30D1BS
EXISTING WELL: NBU 78
NBU 922-30D1CS
NBU 922-30E2AS
NBU 922-30F1BS
NBU 922-30C3S

EXISTING
WELL PAD

EXISTING
METHANOL
TANK

EXISTING TANK
AND BERM

EXISTING
SEPARATOR

MOVE EXISTING SPOILS PILE TO
PROPOSED LOCATION

CONSTRUCT DIVERSION
DITCH (AS NEEDED)

Sundry Number: 15959 API Well Number: 43047506550000

RECEIVED
Jun. 15, 2011

WELL PAD - NBU 922-30D DESIGN SUMMARY

EXISTING GRADE @ CENTER OF WELL PAD = 4927.2'
FINISHED GRADE ELEVATION = 4925.3'
CUT SLOPES = 1:1
FILL SLOPES = 1.5:1
TOTAL WELL PAD AREA = 3.77 ACRES
TOTAL DISTURBANCE AREA = 4.89 ACRES
SHRINKAGE FACTOR = 1.10
SWELL FACTOR = 1.00

Kerr-McGee Oil & Gas Onshore, LP
1099 18th Street - Denver, Colorado 80202

WELL PAD - NBU 922-30D

WELL PAD - LOCATION LAYOUT
NBU 922-30C3S, NBU 922-30F1BS,
NBU 922-30E2AS, NBU 922-30D1CS,
NBU 922-30D1BS, NBU 922-30D3AS
& NBU 922-30D3DS
LOCATED IN SECTION 30, T9S, R22E,
S.L.B.&M., UINTAH COUNTY, UTAH

609 CONSULTING, LLC
2155 North Main Street
Sheridan, WY 82801
Phone 307-674-0609
Fax 307-674-0182

WELL PAD QUANTITIES

TOTAL CUT FOR WELL PAD = 10,762 C.Y.
TOTAL FILL FOR WELL PAD = 10,070 C.Y.
TOPSOIL @ 6" DEPTH = 3,043 C.Y.
EXCESS MATERIAL = 692 C.Y.

RESERVE PIT QUANTITIES

TOTAL CUT FOR RESERVE PIT
+/- 10,800 CY
RESERVE PIT CAPACITY (2' OF FREEBOARD)
+/- 41,240 BARRELS

WELL PAD LEGEND

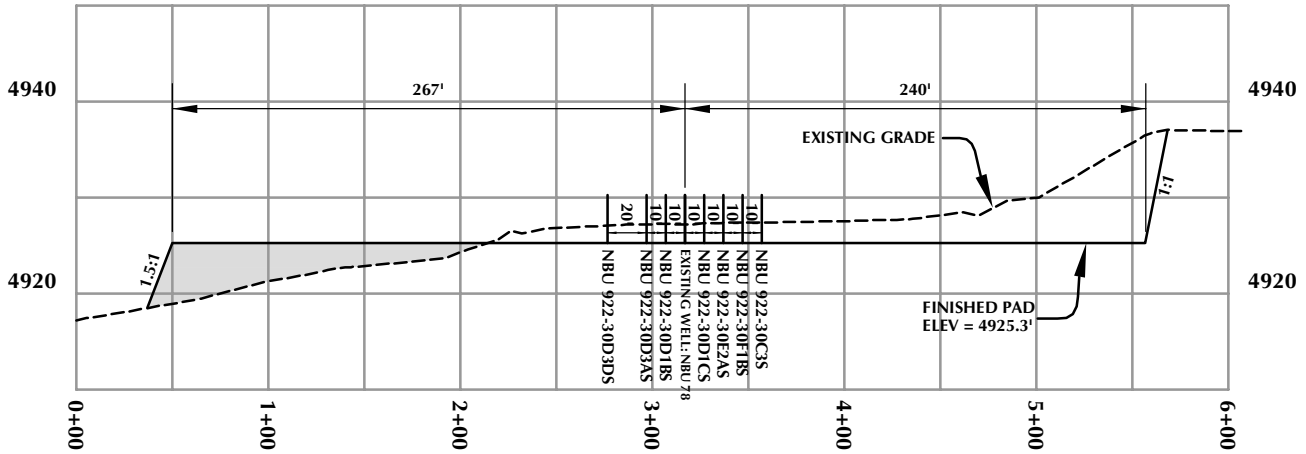
- EXISTING WELL LOCATION
- PROPOSED WELL LOCATION
- PROPOSED BOTTOM HOLE LOCATION
- EXISTING CONTOURS (2' INTERVAL)
- PROPOSED CONTOURS (2' INTERVAL)
- PPL — PROPOSED PIPELINE
- EPL — EXISTING PIPELINE

HORIZONTAL 0 30 60 1" = 60'
2' CONTOURS

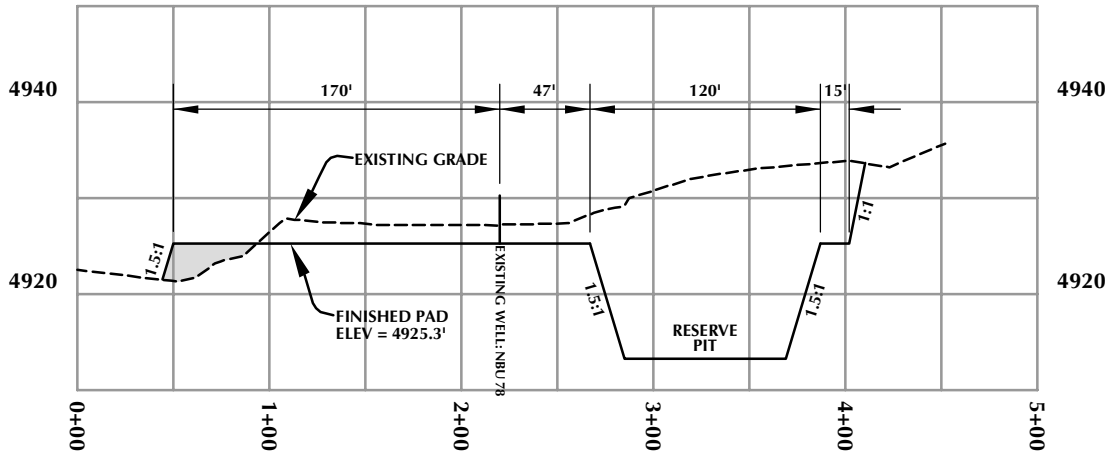
TIMBERLINE (435) 789-1365
ENGINEERING & LAND SURVEYING, INC.
209 NORTH 300 WEST - VERNAL, UTAH 84078

Scale: 1"=60'	Date: 1/14/11	SHEET NO:
REVISED:	TAR 6/9/11	9 9 OF 19

K:\ANADARKO\2010\2010_36_NBU_FOCUS_SEC_922-30\DWGS\NBU 922-30D\NBU_922-30D_PAD_REV_20110514.dwg, 6/9/2011 8:54:07 AM, jacob



CROSS SECTION A-A'



CROSS SECTION B-B'

NOTE: CROSS SECTION B-B' DEPICTS MAXIMUM RESERVE PIT DEPTH.

Kerr-McGee Oil & Gas Onshore, LP
1099 18th Street - Denver, Colorado 80202

WELL PAD - NBU 922-30D

WELL PAD - CROSS SECTIONS
NBU 922-30C3S, NBU 922-30F1BS, NBU 922-30E2AS, NBU 922-30D1CS, NBU 922-30D1BS, NBU 922-30D3AS & NBU 922-30D3DS
LOCATED IN SECTION 30, T9S, R22E, S.L.B.&M., UINTAH COUNTY, UTAH

609 CONSULTING, LLC
2155 North Main Street
Sheridan, WY 82801
Phone 307-674-0609
Fax 307-674-0182

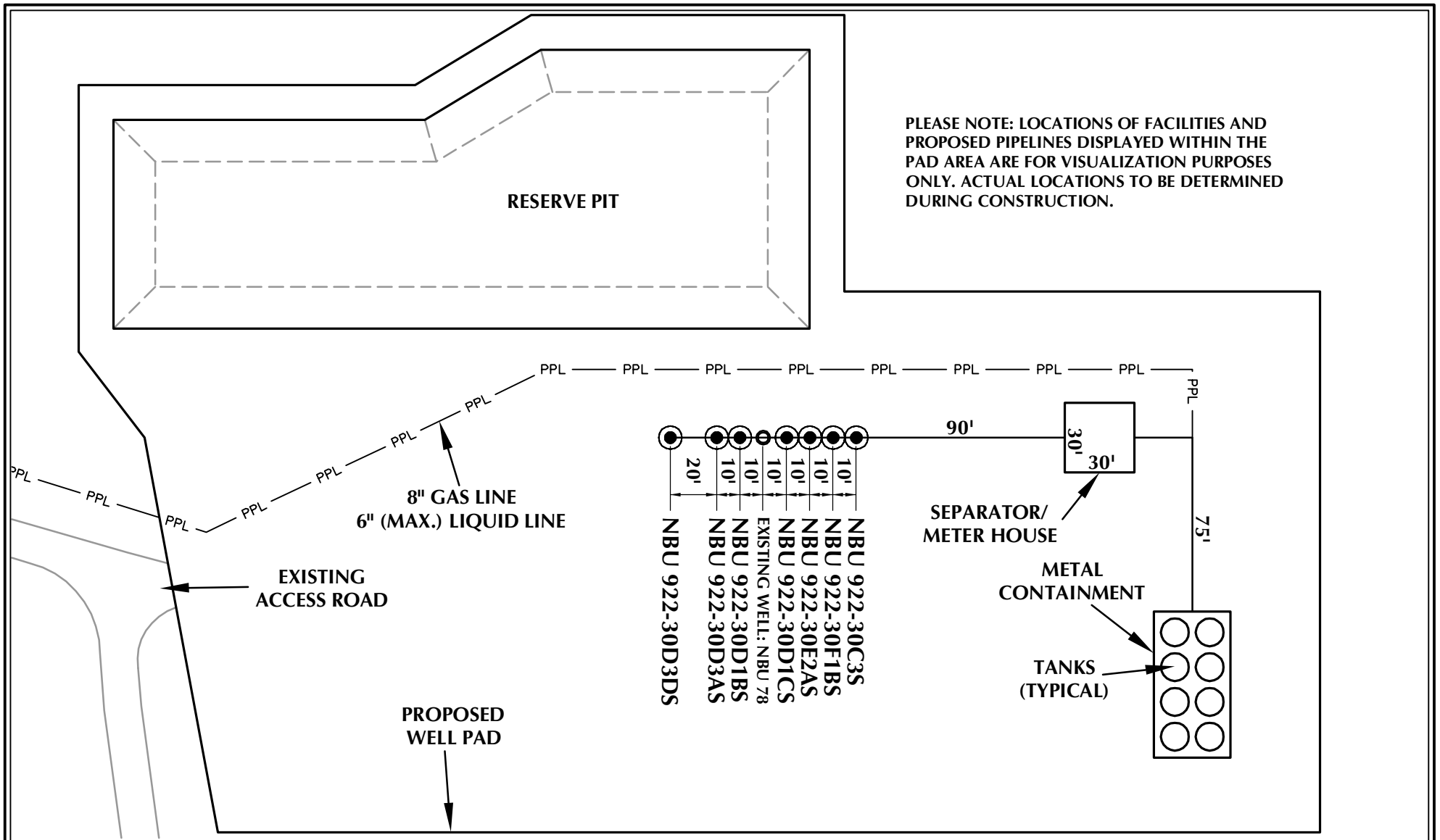
HORIZONTAL 0 50 100 1" = 100'
VERTICAL 0 10 20 1" = 20'

TIMBERLINE ENGINEERING & LAND SURVEYING, INC.
209 NORTH 300 WEST - VERNAL, UTAH 84078
(435) 789-1365

Scale: 1"=100' | Date: 1/14/11 | SHEET NO: 10 10 OF 19
REVISED: TAR 5/18/11

K:\ANADARKO\2010\2010_36_NBU_FOCUS_SEC_922-30\DWGS\NBU 922-30D\NBU_922-30D_PAD_REV_20110524.dwg, 5/18/2011 10:23:24 AM, sarah

RECEIVED Jun. 15, 2011



Kerr-McGee Oil & Gas Onshore, LP
1099 18th Street - Denver, Colorado 80202

WELL PAD - NBU 922-30D

WELL PAD - FACILITIES DIAGRAM
NBU 922-30C3S, NBU 922-30F1BS, NBU 922-30E2AS, NBU 922-30D1CS, NBU 922-30D1BS, NBU 922-30D3AS & NBU 922-30D3DS
LOCATED IN SECTION 30, T9S, R22E, S.L.B.&M., UINTAH COUNTY, UTAH

609 CONSULTING, LLC
2155 North Main Street
Sheridan, WY 82801
Phone 307-674-0609
Fax 307-674-0182

WELL PAD LEGEND

- EXISTING WELL LOCATION
- PROPOSED WELL LOCATION
- PPL — PROPOSED PIPELINE
- EPL — EXISTING PIPELINE

HORIZONTAL 0 30' 60' 1" = 60'

TIMBERLINE ENGINEERING & LAND SURVEYING, INC.
209 NORTH 300 WEST - VERNAL, UTAH 84078
(435) 789-1365

Scale: 1"=60' | Date: 1/14/11 | SHEET NO: 11 11 OF 19
REVISED: TAR 5/13/11

K:\ANADARKO\2010\2010_36_NBU_FOCUS_SEC_922-30\DWGS\NBU 922-30D\NBU_922-30D_PAD_REV_20110524.dwg, 5/16/2011 12:01:54 PM, getty

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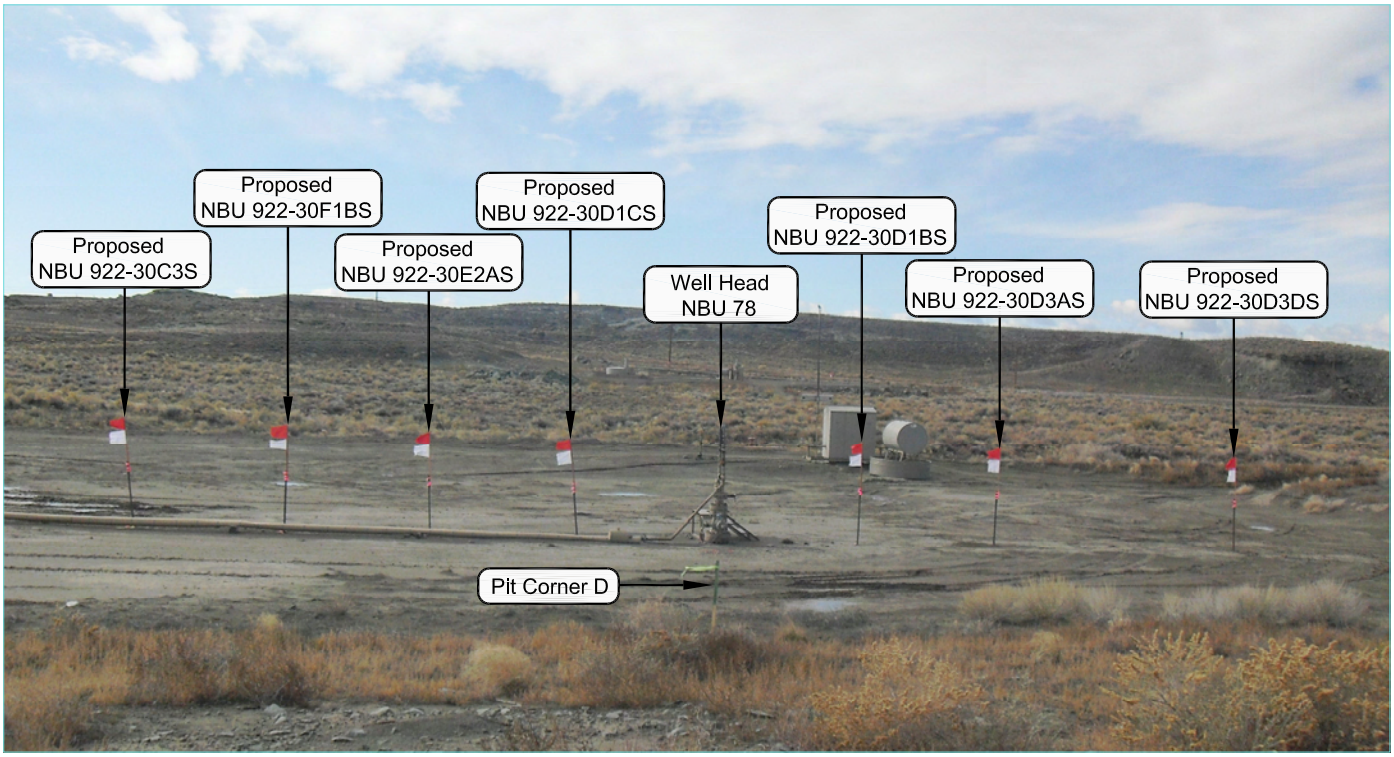

PHOTO VIEW: FROM PIT CORNER D TO LOCATION STAKE **CAMERA ANGLE: SOUTHWESTERLY**

PHOTO VIEW: FROM EXISTING ACCESS ROAD **CAMERA ANGLE: SOUTHEASTERLY**

Kerr-McGee Oil & Gas Onshore, LP
1099 18th Street - Denver, Colorado 80202

WELL PAD - NBU 922-30D

LOCATION PHOTOS
NBU 922-30C3S, NBU 922-30F1BS, NBU 922-30E2AS, NBU 922-30D1CS, NBU 922-30D1BS, NBU 922-30D3AS & NBU 922-30D3DS
LOCATED IN SECTION 30, T9S, R22E, S.L.B.&M., UINTAH COUNTY, UTAH.

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2155 North Main Street
Sheridan WY 82801
Phone 307-674-0609
Fax 307-674-0182

TIMBERLINE (435) 789-1365
ENGINEERING & LAND SURVEYING, INC.
209 NORTH 300 WEST - VERNAL, UTAH 84078

DATE PHOTOS TAKEN: 10-13-10	PHOTOS TAKEN BY: M.S.B.	SHEET NO: 12
DATE DRAWN: 10-15-10	DRAWN BY: E.M.S.	12 OF 19
Date Last Revised: 10-28-10 E.M.S.		

RECEIVED Jun. 15, 2011

Kerr-McGee Oil & Gas Onshore, LP
WELL PAD – NBU 922-30D
WELLS – NBU 922-30C3S, NBU 922-30F1BS,
NBU 922-30E2AS, NBU 922-30D1CS,
NBU 922-30D1BS, NBU 922-30D3AS
& NBU 922-30D3DS
Section 30, T9S, R22E, S.L.B.&M.

From the intersection of U.S. Highway 40 and 500 East Street in Vernal, Utah, proceed in an easterly, then southerly direction along U.S. Highway 40 approximately 3.3 miles to the junction of State Highway 45. Exit right and proceed in a southerly direction along State Highway 45 approximately 20.2 miles to the junction of the Glen Bench Road (County B Road 3260). Exit right and proceed in a southwesterly direction along the Glen Bench Road approximately 17.2 miles to a service road to the southeast. Exit left and proceed in a southeasterly, then easterly, then southerly direction along the service road approximately 0.8 miles to a second service road to the southeast. Exit left and proceed in a southeasterly direction along the second service road approximately 0.6 miles to the proposed well location.

Total distance from Vernal, Utah to the proposed well location is approximately 42.1 miles in a southerly direction.

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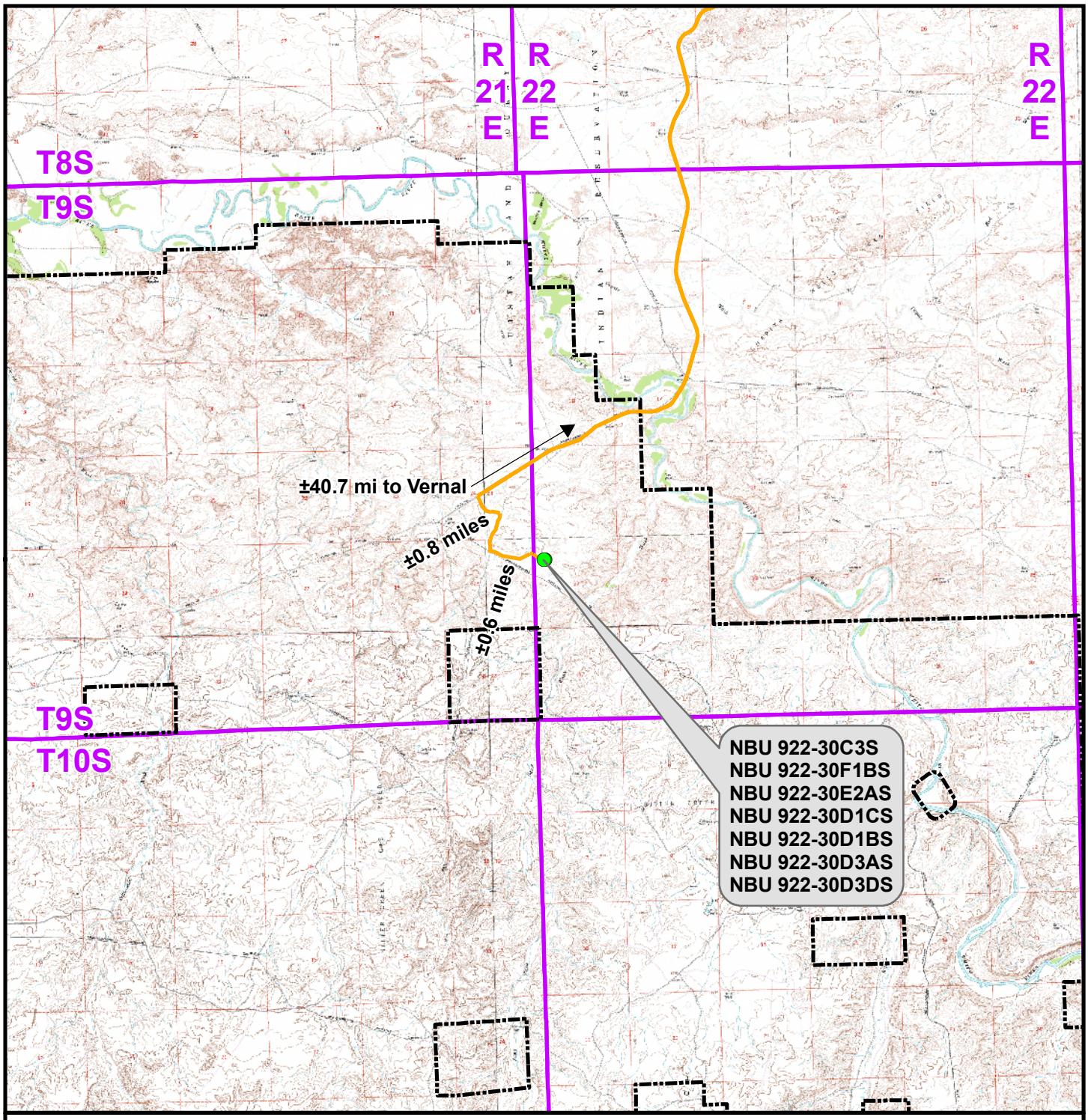


Legend

Distance From Well Pad - NBU 922-30D To Unit Boundary: ±4,088ft

Proposed Well Location

Natural Buttes Unit Boundary

Access Route - Proposed

Kerr-McGee Oil & Gas Onshore, LP
1099 18th Street, Denver, Colorado 80202

WELL PAD - NBU 922-30D

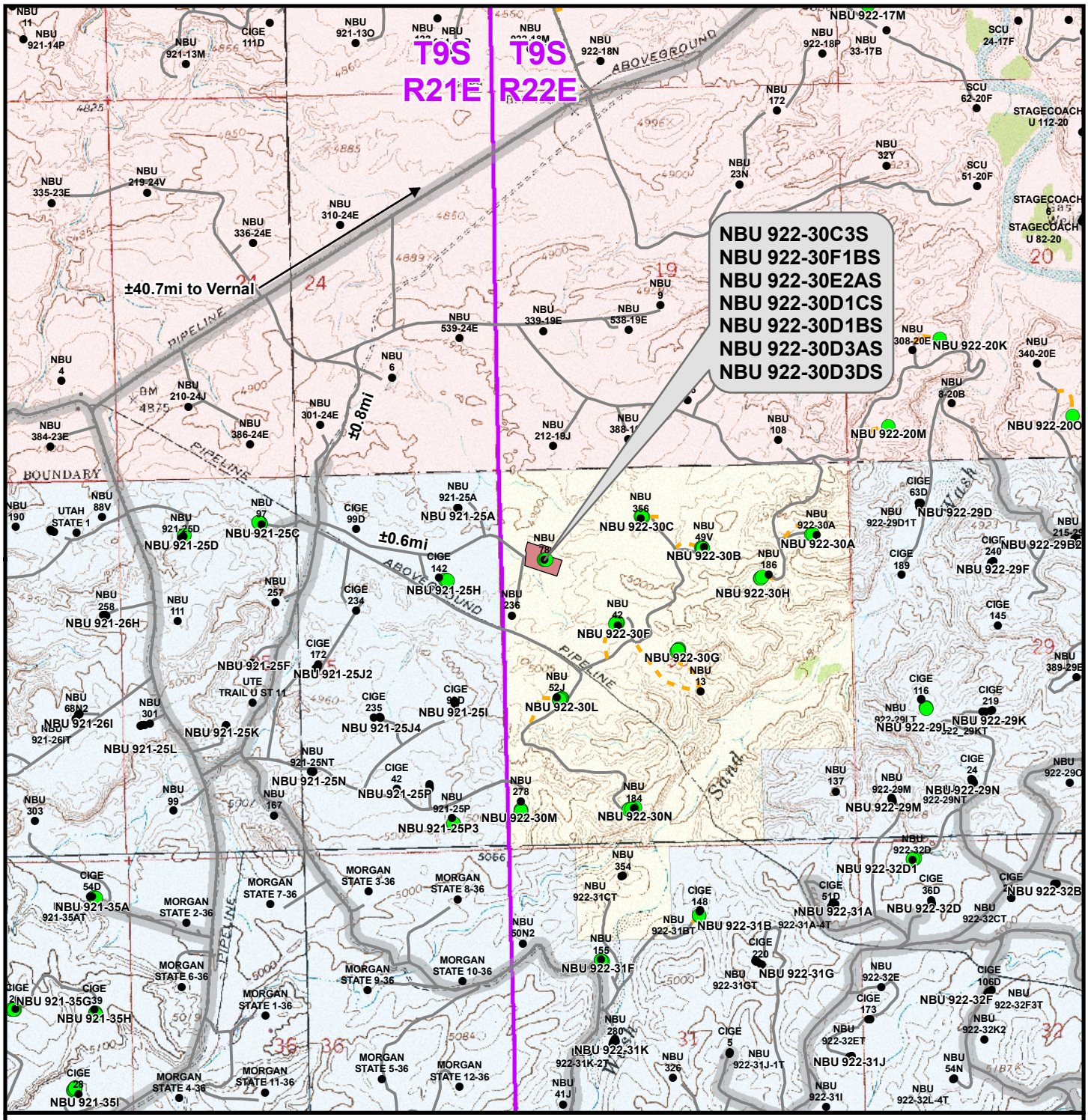
TOPO A
NBU 922-30C3S, NBU 922-30F1BS,
NBU 922-30E2AS, NBU 922-30D1CS,
NBU 922-30D1BS, NBU 922-30D3AS
& NBU 922-30D3DS
LOCATED IN SECTION 30, T9S, R22E,
S.L.B.&M., UINTAH COUNTY, UTAH

609 CONSULTING, LLC
2155 North Main Street
Sheridan, WY 82801
Phone (307) 674-0609
Fax (307) 674-0182

N

Scale: 1:100,000	NAD83 USP Central	Sheet No: 13 of 19
Drawn: TL	Date: 14 Jan 2011	
Revised: TL	Date: 13 May 2011	

RECEIVED Jun. 15, 2011



Legend

Total Proposed Road Length: ±0ft

- Well - Proposed
- Well - Existing
- Well Pad
- Road - Proposed
- Road - Existing
- County Road
- Bureau of Land Management
- Indian Reservation
- State
- Private

Kerr-McGee Oil & Gas Onshore, LP
1099 18th Street, Denver, Colorado 80202

WELL PAD - NBU 922-30D

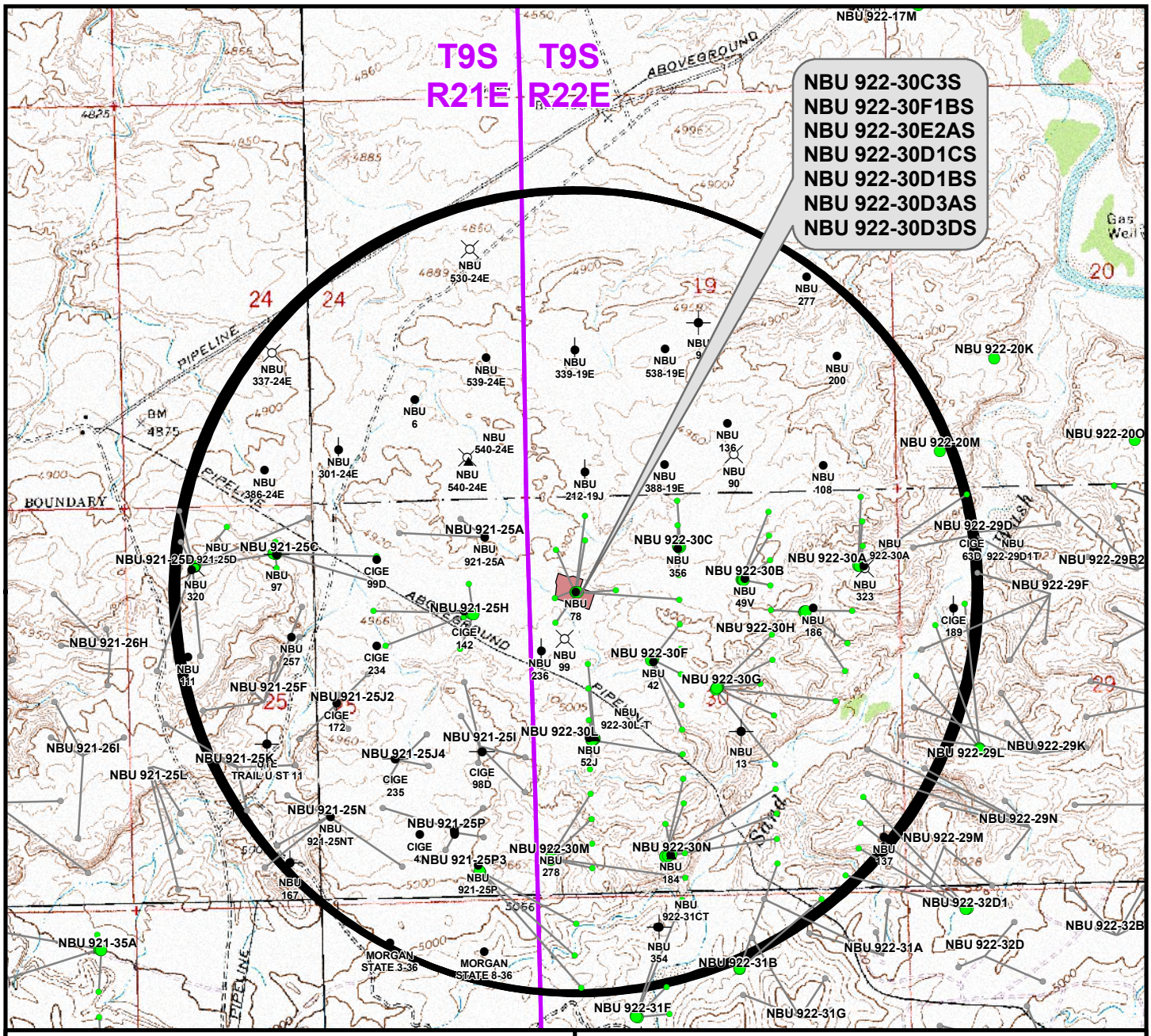
TOPO B
NBU 922-30C3S, NBU 922-30F1BS,
NBU 922-30E2AS, NBU 922-30D1CS,
NBU 922-30D1BS, NBU 922-30D3AS
& NBU 922-30D3DS
LOCATED IN SECTION 30, T9S, R22E,
S.L.B.&M., UINTAH COUNTY, UTAH

609 CONSULTING, LLC
2155 North Main Street
Sheridan, WY 82801
Phone (307) 674-0609
Fax (307) 674-0182

N

Scale: 1" = 2,000ft	NAD83 USP Central	Sheet No: 14	14 of 19
Drawn: TL	Date: 14 Jan 2011		
Revised: TL	Date: 13 May 2011		

RECEIVED Jun. 15, 2011



Proposed Well	Nearest Well Bore	Footage
NBU 922-30C3S	NBU 78	528ft
NBU 922-30F1BS	NBU 356	676ft
NBU 922-30E2AS	NBU 236	421ft
NBU 922-30D1CS	NBU 78	685ft

Proposed Well	Nearest Well Bore	Footage
NBU 922-30D1BS	NBU 212-19J	578ft
NBU 922-30D3AS	NBU 78	609ft
NBU 922-30D3DS	NBU 78	284ft

Well locations derived from State of Utah, Dept. of Natural Resources, Division of Oil, Gas and Mining

Legend

- Well - Proposed
- Bottom Hole - Proposed
- Well Pad
- Well Path
- Bottom Hole - Existing
- Well - 1 Mile Radius

- Producing
- Active
- Spudded (Drilling commenced: Not yet completed)
- Approved permit (APD); not yet spudded
- New Permit (Not yet approved or drilled)
- Inactive
- Drilling Operations Suspended
- Temporarily-Abandoned
- Shut-In
- Plugged and Abandoned
- Location Abandoned
- Dry hole marker, buried
- Returned APD (Unapproved)

Kerr-McGee Oil & Gas Onshore, LP
1099 18th Street, Denver, Colorado 80202

WELL PAD - NBU 922-30D

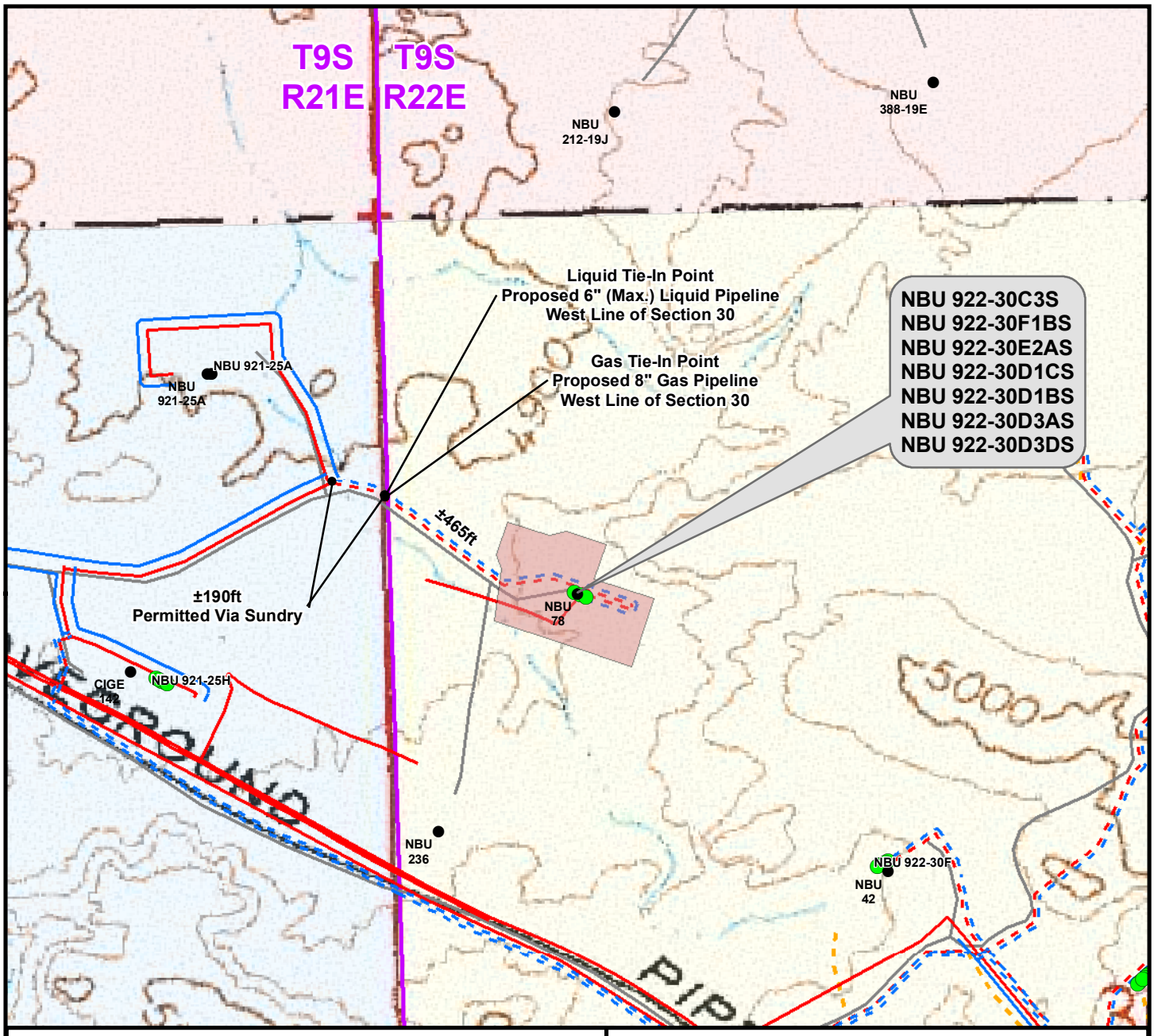
TOPO C
NBU 922-30C3S, NBU 922-30F1BS,
NBU 922-30E2AS, NBU 922-30D1CS,
NBU 922-30D1BS, NBU 922-30D3AS
& NBU 922-30D3DS
LOCATED IN SECTION 30, T9S, R22E,
S.L.B.&M., UINTAH COUNTY, UTAH

609 CONSULTING, LLC
2155 North Main Street
Sheridan, WY 82801
Phone (307) 674-0609
Fax (307) 674-0182

N

Scale: 1" = 2,000ft	NAD83 USP Central	Sheet No: 15 of 19
Drawn: TL	Date: 14 Jan 2011	
Revised: TL	Date: 13 May 2011	

RECEIVED Jun. 15, 2011



Proposed Liquid Pipeline	Length
Buried 6"(Max.) (Meter House to Edge of Pad)	±530ft
Buried 6"(Max.) (Edge of Pad to West Line of Section 30)	±465ft
TOTAL PROPOSED LIQUID PIPELINE =	±995ft

Proposed Gas Pipeline	Length
Buried 8" (Meter House to Edge of Pad)	±530ft
Buried 8" (Edge of Pad to West Line of Section 30)	±465ft
TOTAL PROPOSED GAS PIPELINE =	±995ft

Legend

Well - Proposed; Well - Existing; Well Pad; Gas Pipeline - Proposed; Gas Pipeline - To Be Upgraded; Gas Pipeline - Existing; Liquid Pipeline - Proposed; Liquid Pipeline - To Be Upgraded; Liquid Pipeline - Existing; Road - Proposed; Road - Existing; Bureau of Land Management; Indian Reservation; State; Private

Kerr-McGee Oil & Gas Onshore, LP
1099 18th Street, Denver, Colorado 80202

WELL PAD - NBU 922-30D

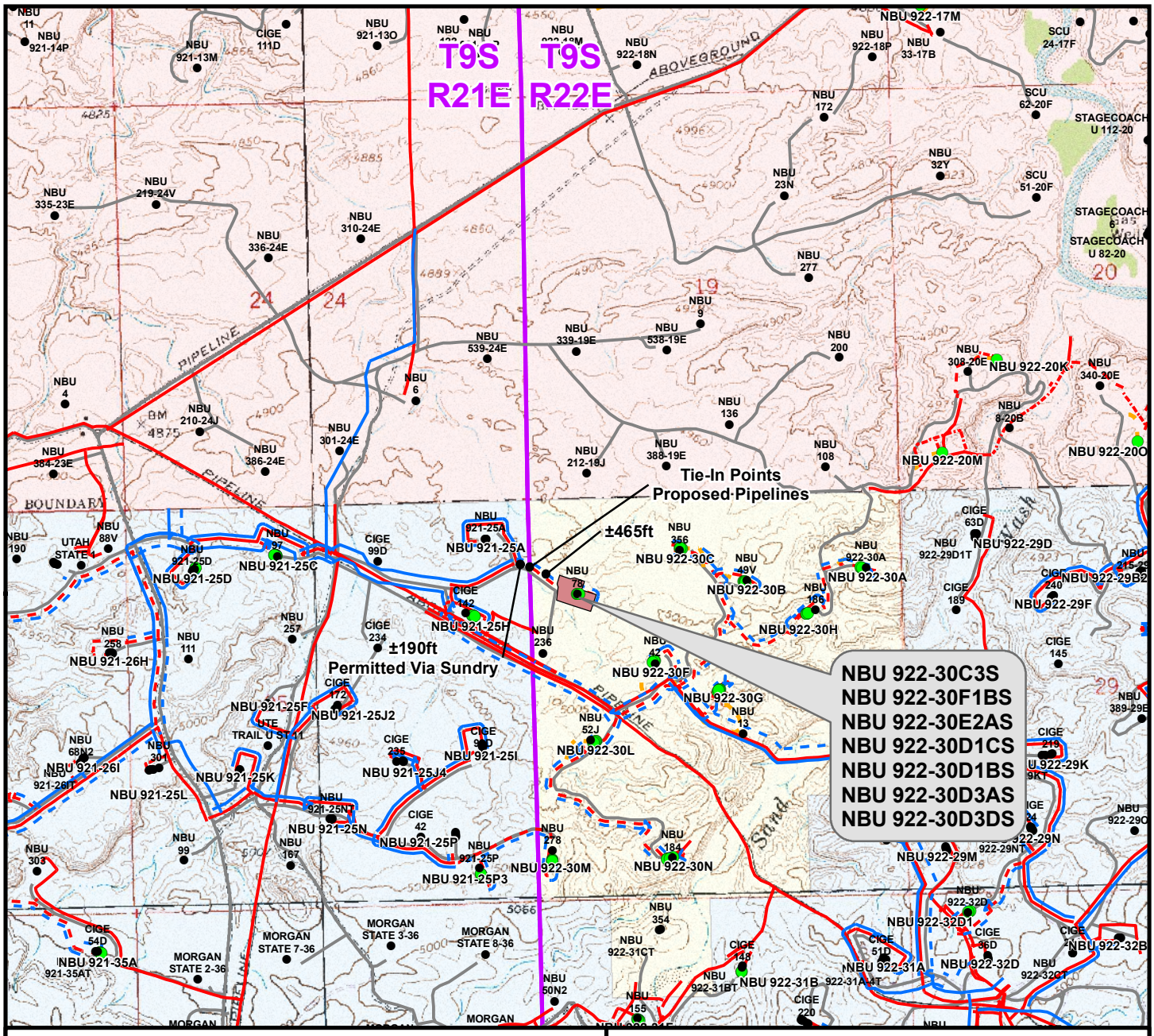
TOPO D2 (PAD & PIPELINE DETAIL)
NBU 922-30C3S, NBU 922-30F1BS,
NBU 922-30E2AS, NBU 922-30D1CS,
NBU 922-30D1BS, NBU 922-30D3AS
& NBU 922-30D3DS
LOCATED IN SECTION 30, T9S, R22E,
S.L.B.&M., UINTAH COUNTY, UTAH

609 CONSULTING, LLC
2155 North Main Street
Sheridan, WY 82801
Phone (307) 674-0609
Fax (307) 674-0182

N

Scale: 1" = 500ft	NAD83 USP Central	Sheet No: 17 of 19
Drawn: TL	Date: 14 Jan 2011	
Revised: TL	Date: 13 May 2011	

RECEIVED Jun. 15, 2011



Proposed Liquid Pipeline	Length
Buried 6"(Max.) (Meter House to Edge of Pad)	±530ft
Buried 6"(Max.) (Edge of Pad to West Line of Section 30)	±465ft
TOTAL PROPOSED LIQUID PIPELINE =	±995ft

Proposed Gas Pipeline	Length
Buried 8" (Meter House to Edge of Pad)	±530ft
Buried 8" (Edge of Pad to West Line of Section 30)	±465ft
TOTAL PROPOSED GAS PIPELINE =	±995ft

Legend

- Well - Proposed
- Well - Existing
- Well Pad
- Gas Pipeline - Proposed
- Gas Pipeline - To Be Upgraded
- Gas Pipeline - Existing
- Liquid Pipeline - Proposed
- Liquid Pipeline - To Be Upgraded
- Liquid Pipeline - Existing
- Road - Proposed
- Road - Existing
- Bureau of Land Management
- Indian Reservation
- State
- Private

Kerr-McGee Oil & Gas Onshore, LP
1099 18th Street, Denver, Colorado 80202

WELL PAD - NBU 922-30D

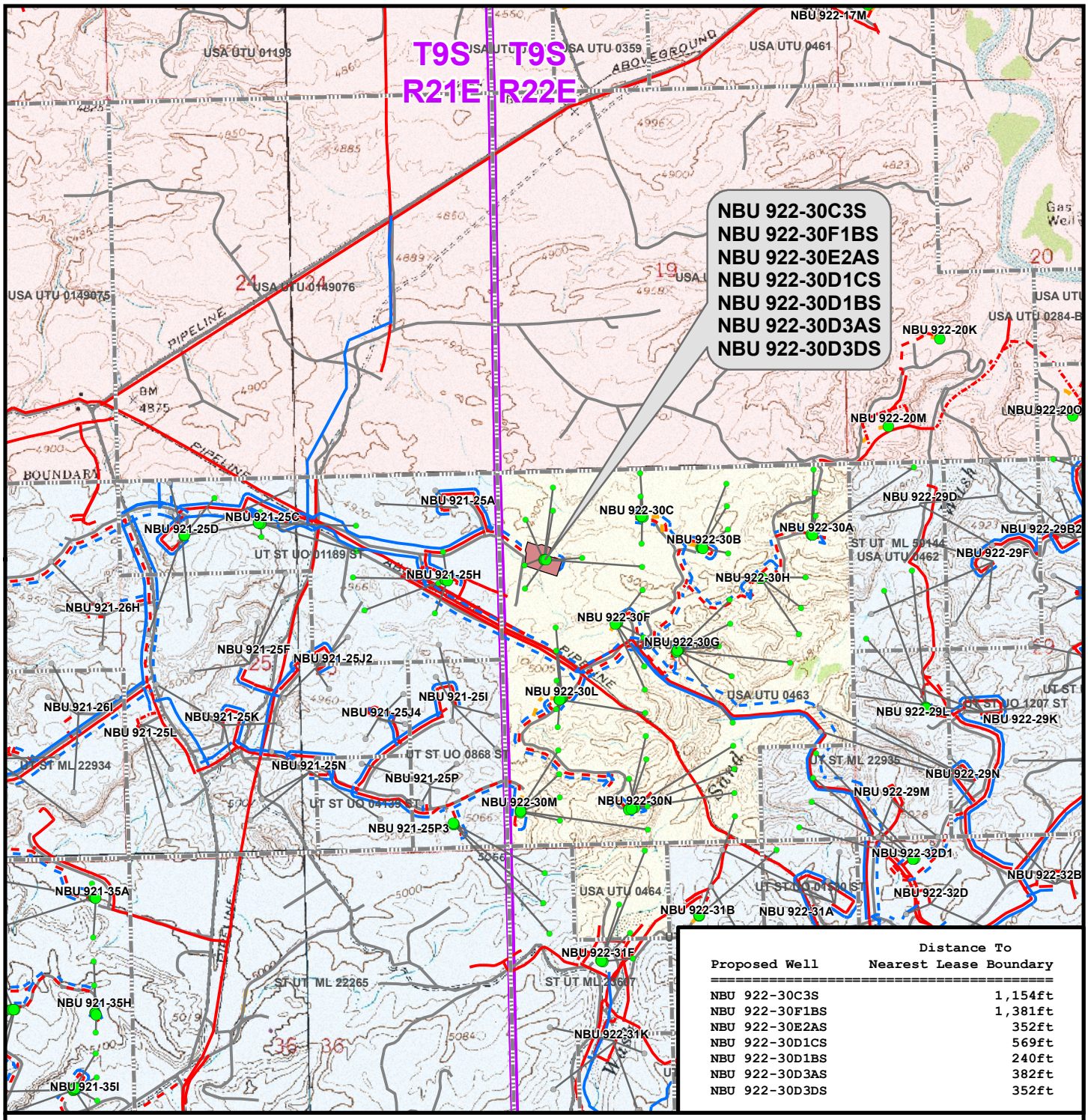
TOPO D
NBU 922-30C3S, NBU 922-30F1BS,
NBU 922-30E2AS, NBU 922-30D1CS,
NBU 922-30D1BS, NBU 922-30D3AS
& NBU 922-30D3DS
LOCATED IN SECTION 30, T9S, R22E,
S.L.B.&M., UINTAH COUNTY, UTAH

609 CONSULTING, LLC
2155 North Main Street
Sheridan, WY 82801
Phone (307) 674-0609
Fax (307) 674-0182

N

Scale: 1" = 2,000ft	NAD83 USP Central	Sheet No: 16 of 19
Drawn: TL	Date: 14 Jan 2011	
Revised: TL	Date: 13 May 2011	

RECEIVED Jun. 15, 2011



Proposed Well	Distance To Nearest Lease Boundary
NBU 922-30C3S	1,154ft
NBU 922-30F1BS	1,381ft
NBU 922-30E2AS	352ft
NBU 922-30D1CS	569ft
NBU 922-30D1BS	240ft
NBU 922-30D3AS	382ft
NBU 922-30D3DS	352ft

Legend

- Well - Proposed
- Bottom Hole - Proposed
- Bottom Hole - Existing
- Well Path
- Well Pad
- Lease Boundary
- Gas Pipeline - Proposed
- Gas Pipeline - To Be Upgraded
- Gas Pipeline - Existing
- Liquid Pipeline - Proposed
- Liquid Pipeline - To Be Upgraded
- Liquid Pipeline - Existing
- Road - Proposed
- Road - Existing
- Bureau of Land Management
- Indian Reservation
- State
- Private

Kerr-McGee Oil & Gas Onshore, LP
1099 18th Street, Denver, Colorado 80202

WELL PAD - NBU 922-30D

TOPO E
NBU 922-30C3S, NBU 922-30F1BS,
NBU 922-30E2AS, NBU 922-30D1CS,
NBU 922-30D1BS, NBU 922-30D3AS
& NBU 922-30D3DS
LOCATED IN SECTION 30, T9S, R22E,
S.L.B.&M., UINTAH COUNTY, UTAH

609 CONSULTING, LLC
2155 North Main Street
Sheridan, WY 82801
Phone (307) 674-0609
Fax (307) 674-0182

N

Scale: 1" = 2,000ft	NAD83 USP Central	Sheet No:	18 of 19
Drawn: TL	Date: 14 Jan 2011		
Revised: TL	Date: 13 May 2011		

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Kerr-McGee Oil & Gas Onshore. L.P.

NBU 922-30D3DS

Surface:	1226 FNL / 588 FWL	NWNW
BHL:	1314 FNL / 352 FWL	NWNW

Section 30 T9S R22E

Uintah County, Utah
Mineral Lease: UTU-0463

ONSHORE ORDER NO. 1

DRILLING PROGRAM

1. & 2. **Estimated Tops of Important Geologic Markers:**
Estimated Depths of Anticipated Water, Oil, Gas, or Mineral Formations:

Formation	Depth	Resource
Uinta	0 - Surface	
Green River	1446	
Birds Nest	1753	Water
Mahogany	2116	Water
Wasatch	4720	Gas
Mesaverde	7361	Gas
MVU2	8272	Gas
MVL1	8817	Gas
TVD	9597	
TD	9610	

3. **Pressure Control Equipment** (Schematic Attached)

Please refer to the attached Drilling Program

4. **Proposed Casing & Cementing Program:**

Please refer to the attached Drilling Program

5. **Drilling Fluids Program:**

Please refer to the attached Drilling Program

6. **Evaluation Program:**

Please refer to the attached Drilling Program

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7. Abnormal Conditions:

Maximum anticipated bottom hole pressure calculated at 9597' TVD, approximately equals 6,334 psi 0.64 psi/ft = actual bottomhole gradient

Maximum Anticipated Bottom Hole Pressure (MABHP) = Pore Pressure at TD

Maximum anticipated surface pressure equals approximately 4,017 psi (bottom hole pressure minus the pressure of a partially evacuated hole calculated at 0.22 psi/foot, per Onshore Order No. 2).

Per Onshore Order No. 2 - Max Anticipated Surf. Press.(MASP) = (Pore Pressure at next csg point-
(0.22 psi/ft-partial evac gradient x TVD of next csg point))

8. Anticipated Starting Dates:

Drilling is planned to commence immediately upon approval of this application.

9. Variances:

Please refer to the attached Drilling Program.
Onshore Order #2 – Air Drilling Variance

Kerr-McGee Oil & Gas Onshore LP (KMG) respectfully requests a variance to several requirements associated with air drilling outlined in Onshore Order 2

- *Blowout Prevention Equipment (BOPE) requirements;*
- *Mud program requirements; and*
- *Special drilling operation (surface equipment placement) requirements associated with air drilling.*

This Standard Operating Practices addendum provides supporting information as to why KMG current air drilling practices for constructing the surface casing hole should be granted a variance to Onshore Order 2 air drilling requirements.

The reader should note that the air rig is used only to construct a stable surface casing hole through a historically difficult lost circulation zone. A conventional rotary rig follows the air rig, and is used to drill and construct the majority of the wellbore.

More notable, KMG has used the air rig layout and procedures outlined below to drill the surface casing hole in approximately 675 wells without incident of blow out or loss of life.

Background

In a typical well, KMG utilizes an air rig for drilling the surface casing hole, an interval from the surface to surface casing depths, which varies in depth from 1,700 to 2,800 feet. The air rig drilling operation does not drill through productive or over pressured formations in KMG field, but does penetrate the Uinta and Green River Formations. The purpose of the air drilling operation is to overcome the severe loss circulation zone in the Green River known as the Bird's Nest while creating a stable hole for the surface casing. The surface casing hole is generally drilled to approximately 500 feet below the Bird's Nest.

Before the surface air rig is mobilized, a rathole rig is utilized to set and cement conductor pipe through a competent surface formation. Generally, the conductor is set at 40 feet. In some cases, conductor may be set deeper in areas that the surface formation is not found competent. This rig also drills the rat and mouse holes in preparation for the surface casing and production string drilling operations.

The air rig is then mobilized to drill the surface casing hole by drilling a 11 inch hole to just above the Bird's Nest interval with an air hammer. The hammer is then tripped and replaced with a 11 inch tri-cone bit. The tri-cone bit is used to drill to the surface casing point, approximately 500 feet below the loss circulation zone (Bird's Nest). The 8-5/8 inch surface casing is then run and cemented in place, thereby isolating the lost circulation zone.

KMG fully appreciates Onshore Order 2 well control and safety requirements associated with a typical air drilling operations. However, the requirements of Onshore Order 2 are excessive with respect to the air rig layout and drilling operation procedures that are currently in practice to drill and control the surface casing hole in KMG Fields.

Variance for BOPE Requirements
The air rig operation utilizes a properly lubricated and maintained air bowl diverter system which diverts the drilling returns to a six-inch blooie line. The air bowl is the only piece of BOPE equipment which is installed during drilling operations and is sufficient to contain the air returns associated with this drilling operation. As was discussed earlier, the drilling of the surface hole does not encounter any over pressured or productive zones, and as a result standard BOPE equipment should not be required. In addition, standard drilling practices do not support the use of BOPE on 40 feet of conductor pipe.

Variance for Mud Material Requirements
Onshore Order 2 also states that sufficient quantities of mud materials shall be maintained or readily accessible for the purpose of assuring adequate well control. Once again, the surface hole drilling operations does not encounter over pressured or productive intervals, and as a result there is not a need to control pressure in the surface hole with a mud system. Instead of mud, the air rigs utilize water from the reserve pit for well control, if necessary. A skid pump which is located near the reserve pit (see attachment) will supply the water to the well bore.

Variance for Special Drilling Operation (surface equipment placement) Requirements
Onshore Order 2 requires specific safety distances or setbacks for the placement of associated standard air drilling equipment, wellbore, and reserve pits. The air rigs used to drill the surface holes are not typical of an air rig used to drill a producing hole in other parts of the US. These are smaller in nature and designed to fit a KMG location. The typical air rig layout for drilling surface hole in the field is attached.

Typically the blooie line discharge point is required to be 100 feet from the well bore. In the case of a KMG well, the reserve pit is only 45 feet from the rig and is used for the drill cuttings. The blooie line, which transports the drill cuttings from the well to the reserve pit, subsequently discharges only 45 feet from the well bore.

Typically the air rig compressors are required to be located in the opposite direction from the blooie line and a minimum of 100 feet from the well bore. At the KMG locations, the air rig compressors are approximately 40 feet from the well bore and approximately 60 feet from the blooie line discharge due to the unique air rig design. The air compressors (see attachment) are located on the rig (1250 cfm) and

on a standby trailer (1170 cfm). A booster sits between the two compressors and boosts the output from 350 psi to 2000 psi. The design does put the booster and standby compressor opposite from the blooie line.

Lastly, Onshore Order 2 addresses the need for an automatic igniter or continuous pilot light on the blooie line. The air rig does not utilize an igniter as the surface hole drilling operation does not encounter productive formations.

Conclusion

The air rig operating procedures and the attached air rig layout have effectively maintained well control while drilling the surface holes in KMG Fields. KMG respectfully requests a variance from Onshore Order 2 with respect to air drilling well control requirements as discussed above.

10. Other Information:

Please refer to the attached Drilling Program.

KERR-McGEE OIL & GAS ONSHORE LP

DRILLING PROGRAM

COMPANY NAME	KERR-McGEE OIL & GAS ONSHORE LP			DATE	June 15, 2011
WELL NAME	**NBU 922-30D3DS**			TD	9,597' TVD 9,610' MD
FIELD	Natural Buttes	COUNTY	Uintah	STATE	Utah FINISHED ELEVATION 4925'
SURFACE LOCATION	NWNW 1226 FNL 588 FWL	Sec 30	T 9S	R 22E	
	Latitude: 40.010881	Longitude:	-109.488569		NAD 83
BTM HOLE LOCATION	NWNW 1314 FNL 352 FWL	Sec 30	T 9S	R 22E	
	Latitude: 40.010634	Longitude:	-109.489411		NAD 83
OBJECTIVE ZONE(S)	Wasatch/Mesaverde				
ADDITIONAL INFO	Regulatory Agencies: BLM (Minerals), BLM (Surface), UDOGM Tri-County Health Dept.				

GEOLOGICAL			MECHANICAL		
LOGS	FORMATION TOPS	DEPTH	HOLE SIZE	CASING SIZE	MUD WEIGHT
		40'	14"		
			12-1/4	8-5/8", 28#, IJ-55, LTC	Air mist
		200'			
			11'	8-5/8", 28#, IJ-55, LTC	Air mist

All water flows encountered while drilling will be reported to the appropriate agencies.

Green River @	1,446'
Top of Birds Nest @	1,753'
Mahogany @	2,116'
Preset f/ GL @ 2,570' TVD	

Note: 11" surface hole will usually be drilled ±400' below the lost circulation zone (aka bird's nest). Drilled depth may be ±200' of the estimated set depth depending on the acutal depth of the loss zone.

Wasatch @	4,720'
Mverde @	7,361' TVD
MVU2 @	8,272' TVD
MVU1 @	8,817' TVD

Mud logging program TBD
Cased hole logging program from TD - surf csg

7-7/8"	4-1/2" 11.6# I-80 or equivalent BTC/LTC csg	Water / Fresh Water Mud 8.3-12.5 ppg

Max anticipated Mud required 12.5 ppg

TD @ 9,597' TVD 9,610' MD

KERR-McGEE OIL & GAS ONSHORE LP

DRILLING PROGRAM

CASING PROGRAM

	SIZE	INTERVAL			WT.	GR.	CPLG.	DESIGN FACTORS BURST	COLLAPSE	LTC	BTC TENSION
CONDUCTOR	14"	0-40'									
								3,390	1,880	348,000	N/A
SURFACE	8-5/8"	0	to	2,570	28.00	IJ-55	LTC	2.10	1.56	5.52	N/A
								7,780	6,350	279,000	367,000
PRODUCTION	4-1/2"	0	to	9,610	11.60	I-80	LTC/BTC	1.11	1.02	3.09	4.07

Surface Casing:

(Burst Assumptions: TD = 12.5 ppg) 0.73 psi/ft = frac gradient @ surface shoe

Fracture at surface shoe with 0.1 psi/ft gas gradient above

(Collapse Assumption: Fully Evacuated Casing, Max MW) (Tension Assumptions: Air Weight of Casing*Buoy.Fact. of water)

Production casing:

(Burst Assumptions: Pressure test with 8.4ppg @ 7000 psi) 0.64 psi/ft = bottomhole gradient

(Collapse Assumption: Fully Evacuated Casing, Max MW) (Tension Assumptions: Air Weight of Casing*Buoy.Fact. of water)

CEMENT PROGRAM

		FT. OF FILL	DESCRIPTION	SACKS	EXCESS	WEIGHT	YIELD
SURFACE	LEAD	500'	Premium cmt + 2% CaCl	180	60%	15.80	1.15
Option 1			+ 0.25 pps flocele				
	TOP OUT CMT (6 jobs)	1,200'	20 gals sodium silicate + Premium cmt	270	0%	15.80	1.15
			+ 2% CaCl + 0.25 pps flocele				
SURFACE			**NOTE: If well will circulate water to surface, option 2 will be utilized**				
Option 2	LEAD	2,070'	65/35 Poz + 6% Gel + 10 pps gilsonite	190	35%	11.00	3.82
			+ 0.25 pps Flocele + 3% salt BWOW				
	TAIL	500'	Premium cmt + 2% CaCl	150	35%	15.80	1.15
			+ 0.25 pps flocele				
	TOP OUT CMT	as required	Premium cmt + 2% CaCl	as req.		15.80	1.15
PRODUCTION	LEAD	4,220'	Premium Lite II +0.25 pps	320	20%	11.00	3.38
			celloflake + 5 pps gilsonite + 10% gel				
			+ 0.5% extender				
	TAIL	5,390'	50/50 Poz/G + 10% salt + 2% gel	1,270	35%	14.30	1.31
			+ 0.1% R-3				

*Substitute caliper hole volume plus 0% excess for LEAD if accurate caliper is obtained

*Substitute caliper hole volume plus 10% excess for TAIL if accurate caliper is obtained

FLOAT EQUIPMENT & CENTRALIZERS

SURFACE	Guide shoe, 1 jt, insert float. Centralize first 3 joints with bow spring centralizers. Thread lock guide shoe
PRODUCTION	Float shoe, 1 jt, float collar. No centralizers will be used.

ADDITIONAL INFORMATION

Test casing head to 750 psi after installing. Test surface casing to 1,500 psi prior to drilling out.

BOPE: 11" 5M with one annular and 2 rams. The BOPE will be installed before the production hole is drilled and tested to 5,000 psi (annular to 2,500 psi) prior to drilling out the surface casing shoe. Record on chart recorder and tour sheet. Function test rams on each trip. Maintain safety valve and inside BOP on rig floor at all times. Most rigs have top drives; however, if used, the Kelly is to be equipped with upper and lower kelly valves.

Surveys will be taken at 1,000' minimum intervals.

Most rigs have PVT System for mud monitoring. If no PVT is available, visual monitoring will be utilized.

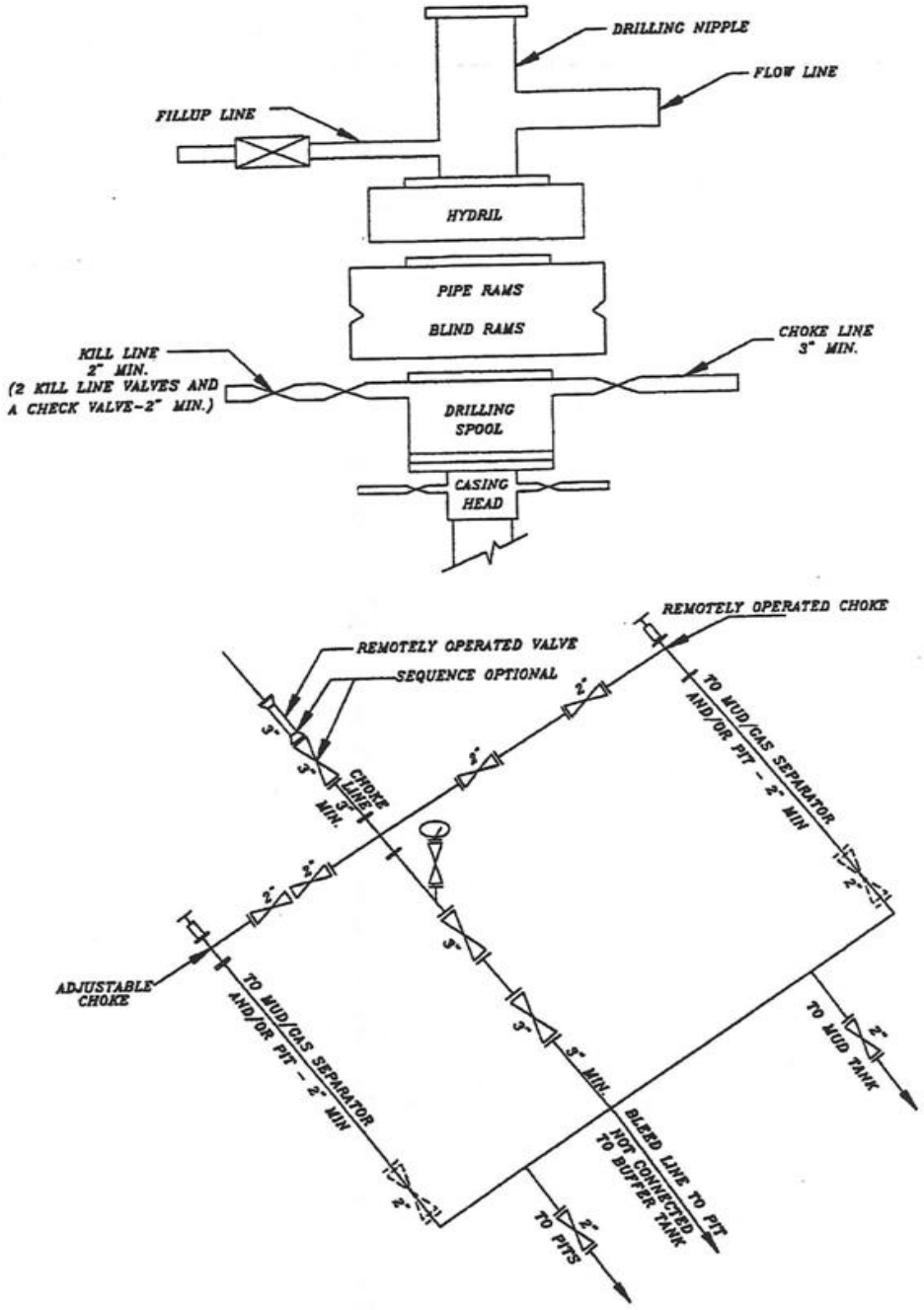
DRILLING ENGINEER: _____ **DATE:** _____

Nick Spence / Emile Goodwin

DRILLING SUPERINTENDENT: _____ **DATE:** _____

Kenny Gathings / Lovel Young

EXHIBIT A
NBU 922-30D3DS



RECEIVED Jun. 15, 2011

Scientific Drilling
Rocky Mountain Operations

Project: Uintah County, UT UTM12
Site: NBU 922-30D PAD
Well: NBU 922-30D3DS
Wellbore: OH
Design: PLAN #1 PRELIMINARY

Anadarko Petroleum Corporation

WELL DETAILS: NBU 922-30D3DS

GL 4925' & KB 9' @ 4934.00ft (ASSUMED)

+N/-S	+E/-W	Northing	Easting	Latittude	Longitude
0.00	0.00	14533612.02	2063838.78	40° 0' 39.298 N	109° 29' 16.379 W

DESIGN TARGET DETAILS

Name	TVD	+N/-S	+E/-W	Northing	Easting	Latitude	Longitude	Shape
PBHL	9597.00	-89.96	-235.82	14533518.07	2063604.52	40° 0' 38.408 N	109° 29' 19.410 W	Circle (Radius: 25.0
- plan hits target center								

FORMATION TOP DETAILS

TVDPath	MDPath	Formation
1446.00	1451.23	GREEN RIVER
4720.00	4732.66	WASATCH
7361.00	7373.66	MESAVERDE

CASING DETAILS

TVD	MD	Name	Size
2566.00	2577.41	8 5/8"	8.625

SECTION DETAILS

MD	Inc	Azi	TVD	+N/-S	+E/-W	Dleg	TFace	VSect	
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
300.00	0.00	0.00	300.00	0.00	0.00	0.00	0.00	0.00	
600.45	6.01	249.12	599.90	-5.61	-14.71	2.00	249.12	15.74	
2689.29	6.01	249.12	2677.26	-83.55	-219.01	0.00	0.00	234.41	
3032.66	0.00	0.00	3020.00	-89.96	-235.82	1.75	180.00	252.40	
9609.66	0.00	0.00	9597.00	-89.96	-235.82	0.00	0.00	252.40	PBHL_NBU 922-30D3DS

PROJECT DETAILS: Uintah County, UT UTM12

Geodetic System: Universal Transverse Mercator (US Survey Feet)
Datum: NAD 1927 - Western US
Ellipsoid: Clarke 1866
Zone: Zone 12N (114 W to 108 W)
Location: SECTION 30 T9S R22E
System Datum: Mean Sea Level

RECEIVED Jun. 15, 2011

Scientific Drilling
Rocky Mountain Operations

Project: Uintah County, UT UTM12
Site: NBU 922-30D PAD
Well: NBU 922-30D3DS
Wellbore: OH
Design: PLAN #1 PRELIMINARY

Anadarko Petroleum Corporation

WELL DETAILS: NBU 922-30D3DS

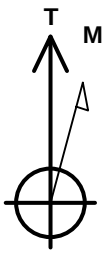
GL 4925' & KB 9' @ 4934.00ft (ASSUMED)

+N/-S	+E/-W	Northing	Easting	Latitude	Longitude
0.00	0.00	14533612.02	2063838.78	40° 0' 39.298 N	109° 29' 16.379 W

DESIGN TARGET DETAILS

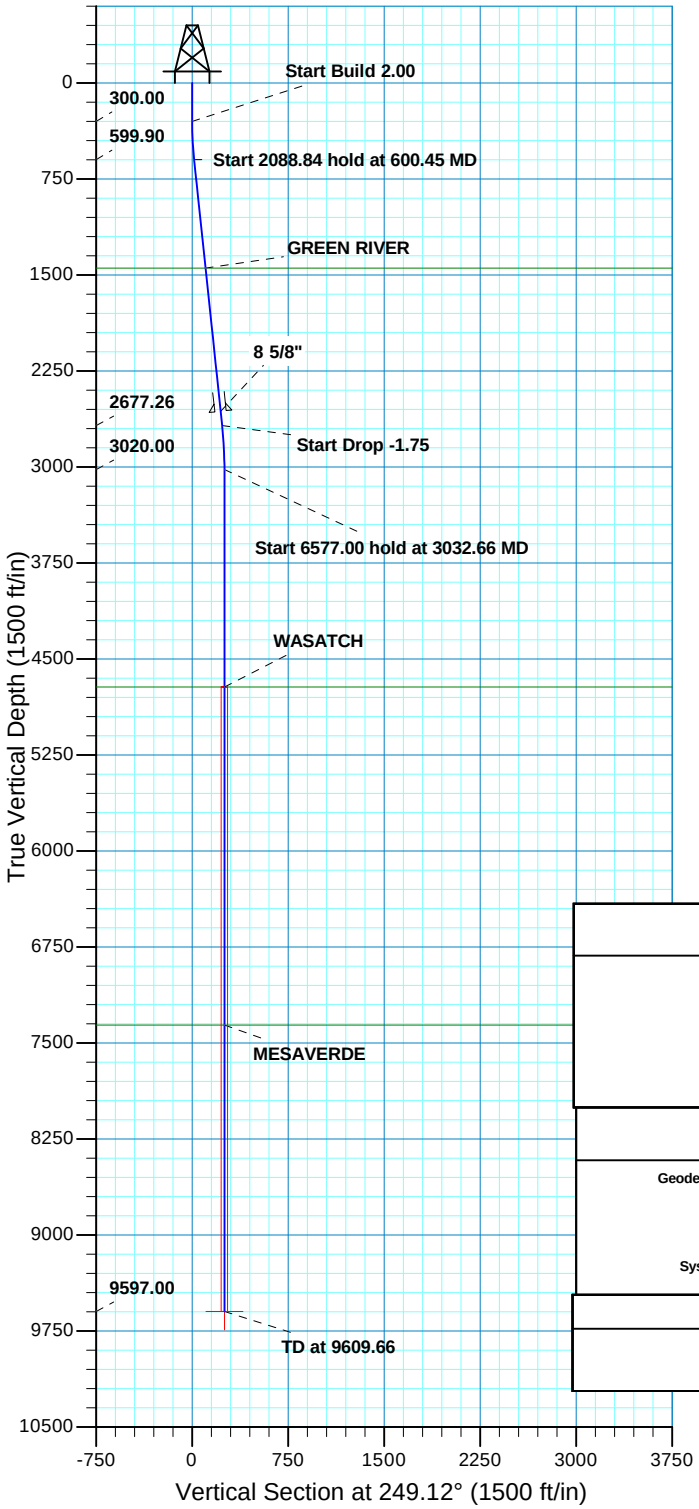
Name	TVD	+N/-S	+E/-W	Northing	Easting	Latitude	Longitude	Shape
PBHL	9597.00	-89.96	-235.82	14533518.07	2063604.52	40° 0' 38.408 N	109° 29' 19.410 W	Circle (Radius: 25.00)

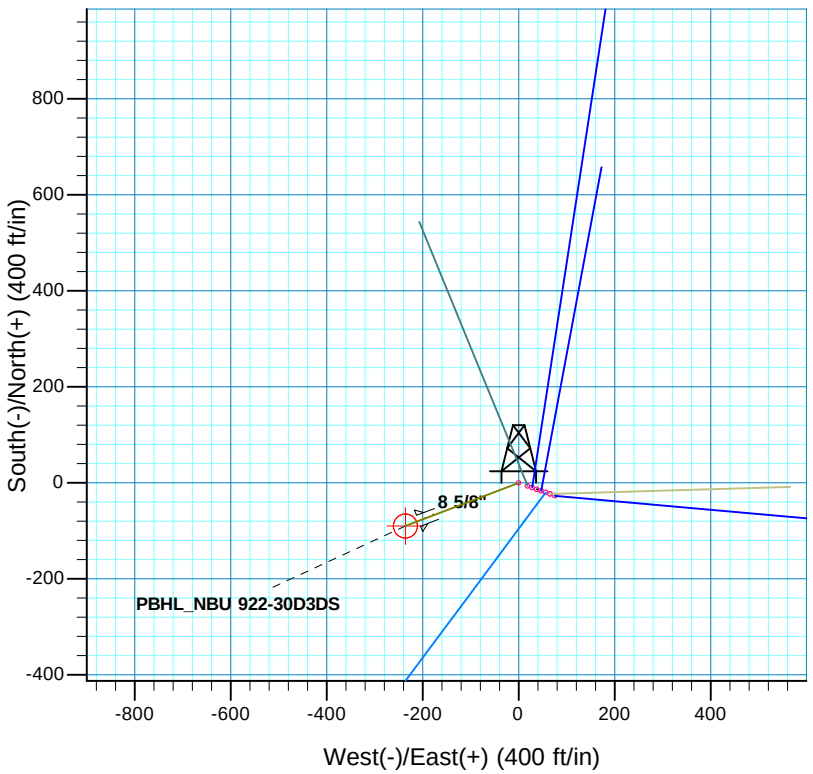
- plan hits target center



Azimuths to True North
Magnetic North: 11.08°

Magnetic Field
Strength: 52340.6snT
Dip Angle: 65.88°
Date: 06/02/2011
Model: IGRF2010





SECTION DETAILS

MD	Inc	Azi	TVD	+N/-S	+E/-W	Dleg	TFace	VSect	
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
300.00	0.00	0.00	300.00	0.00	0.00	0.00	0.00	0.00	
600.45	6.01	249.12	599.90	-5.61	-14.71	2.00	249.12	15.74	
2689.29	6.01	249.12	2677.26	-83.55	-219.01	0.00	0.00	234.41	
3032.66	0.00	0.00	3020.00	-89.96	-235.82	1.75	180.00	252.40	
9609.66	0.00	0.00	9597.00	-89.96	-235.82	0.00	0.00	252.40	PBHL_NBU 922-30D3DS

PROJECT DETAILS: Uintah County, UT UTM12

Geodetic System: Universal Transverse Mercator (US Survey Feet)
Datum: NAD 1927 - Western US
Ellipsoid: Clarke 1866
Zone: Zone 12N (114 W to 108 W)
Location: SECTION 30 T9S R22E
System Datum: Mean Sea Level

FORMATION TOP DETAILS

TVDPath	MDPath	Formation
1446.00	1451.23	GREEN RIVER
4720.00	4732.66	WASATCH
7361.00	7373.66	MESAVERDE

CASING DETAILS

TVD	MD	Name	Size
2566.00	2577.41	8 5/8"	8.625

RECEIVED Jun. 15, 2011

Plan: PLAN #1 PRELIMINARY (NBU 922-30D3DS/OH)
Created By: RobertScott Date: 12:27, June 06 2011

Scientific Drilling
Rocky Mountain Operations

Kerr McGee Oil and Gas Onshore LP

Uintah County, UT UTM12
NBU 922-30D PAD
NBU 922-30D3DS

OH

Plan: PLAN #1 PRELIMINARY

Standard Planning Report

06 June, 2011

Anadarko Petroleum Corporation

RECEIVED Jun. 15, 2011

Scientific Drilling
Rocky Mountain Operations

SDI
Planning Report

Anadarko Petroleum Corporation

Database:	EDM5000-RobertS-Local	**Local Co-ordinate Reference:**	Well NBU 922-30D3DS
Company:	Kerr McGee Oil and Gas Onshore LP	**TVD Reference:**	GL 4925' & KB 9' @ 4934.00ft (ASSUMED)
Project:	Uintah County, UT UTM12	**MD Reference:**	GL 4925' & KB 9' @ 4934.00ft (ASSUMED)
Site:	NBU 922-30D PAD	**North Reference:**	True
Well:	NBU 922-30D3DS	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	OH		
Design:	PLAN #1 PRELIMINARY		

Project Uintah County, UT UTM12

Map System:	Universal Transverse Mercator (US Survey Feet)	**System Datum:**	Mean Sea Level
Geo Datum:	NAD 1927 - Western US		
Map Zone:	Zone 12N (114 W to 108 W)		

Site NBU 922-30D PAD, SECTION 30 T9S R22E

Site Position:		**Northing:**	14,533,586.35 usft	**Latitude:**	40° 0' 39.031 N
From:	Lat/Long	**Easting:**	2,063,914.56 usft	**Longitude:**	109° 29' 15.410 W
Position Uncertainty:	0.00 ft	**Slot Radius:**	13.200 in	**Grid Convergence:**	0.97 °

Well NBU 922-30D3DS, 1226 FNL 558 FWL

Well Position	**+N/-S**	26.95 ft	**Northing:**	14,533,612.02 usft	**Latitude:**	40° 0' 39.298 N
	+E/-W	-75.34 ft	**Easting:**	2,063,838.77 usft	**Longitude:**	109° 29' 16.379 W
Position Uncertainty		0.00 ft	**Wellhead Elevation:**		**Ground Level:**	4,925.00 ft

Wellbore OH

Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF2010	06/02/2011	11.08	65.88	52,341

Design PLAN #1 PRELIMINARY

Audit Notes:

Version:		**Phase:**	PLAN	**Tie On Depth:**	0.00

Vertical Section:	Depth From (TVD) (ft)	+N/-S (ft)	+E/-W (ft)	Direction (°)
	0.00	0.00	0.00	249.12

Plan Sections

Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)	TFO (°)	Target
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
300.00	0.00	0.00	300.00	0.00	0.00	0.00	0.00	0.00	0.00	
600.45	6.01	249.12	599.90	-5.61	-14.71	2.00	2.00	0.00	249.12	
2,689.29	6.01	249.12	2,677.26	-83.55	-219.01	0.00	0.00	0.00	0.00	
3,032.66	0.00	0.00	3,020.00	-89.96	-235.82	1.75	-1.75	0.00	180.00	
9,609.66	0.00	0.00	9,597.00	-89.96	-235.82	0.00	0.00	0.00	0.00	PBHL_NBU 922-30D3

Scientific Drilling
Rocky Mountain Operations

SDI
Planning Report

Anadarko Petroleum Corporation

Database:	EDM5000-RobertS-Local	**Local Co-ordinate Reference:**	Well NBU 922-30D3DS
Company:	Kerr McGee Oil and Gas Onshore LP	**TVD Reference:**	GL 4925' & KB 9' @ 4934.00ft (ASSUMED)
Project:	Uintah County, UT UTM12	**MD Reference:**	GL 4925' & KB 9' @ 4934.00ft (ASSUMED)
Site:	NBU 922-30D PAD	**North Reference:**	True
Well:	NBU 922-30D3DS	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	OH		
Design:	PLAN #1 PRELIMINARY		

Planned Survey

Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
100.00	0.00	0.00	100.00	0.00	0.00	0.00	0.00	0.00	0.00
200.00	0.00	0.00	200.00	0.00	0.00	0.00	0.00	0.00	0.00
300.00	0.00	0.00	300.00	0.00	0.00	0.00	0.00	0.00	0.00
400.00	2.00	249.12	399.98	-0.62	-1.63	1.75	2.00	2.00	0.00
500.00	4.00	249.12	499.84	-2.49	-6.52	6.98	2.00	2.00	0.00
600.00	6.00	249.12	599.45	-5.59	-14.66	15.69	2.00	2.00	0.00
600.45	6.01	249.12	599.90	-5.61	-14.71	15.74	2.00	2.00	0.00
700.00	6.01	249.12	698.90	-9.32	-24.44	26.16	0.00	0.00	0.00
800.00	6.01	249.12	798.35	-13.06	-34.22	36.63	0.00	0.00	0.00
900.00	6.01	249.12	897.80	-16.79	-44.01	47.10	0.00	0.00	0.00
1,000.00	6.01	249.12	997.25	-20.52	-53.79	57.57	0.00	0.00	0.00
1,100.00	6.01	249.12	1,096.70	-24.25	-63.57	68.04	0.00	0.00	0.00
1,200.00	6.01	249.12	1,196.16	-27.98	-73.35	78.50	0.00	0.00	0.00
1,300.00	6.01	249.12	1,295.61	-31.71	-83.13	88.97	0.00	0.00	0.00
1,400.00	6.01	249.12	1,395.06	-35.44	-92.91	99.44	0.00	0.00	0.00
1,451.23	6.01	249.12	1,446.00	-37.35	-97.92	104.80	0.00	0.00	0.00
GREEN RIVER									
1,500.00	6.01	249.12	1,494.51	-39.17	-102.69	109.91	0.00	0.00	0.00
1,600.00	6.01	249.12	1,593.96	-42.90	-112.47	120.38	0.00	0.00	0.00
1,700.00	6.01	249.12	1,693.41	-46.64	-122.25	130.85	0.00	0.00	0.00
1,800.00	6.01	249.12	1,792.86	-50.37	-132.03	141.31	0.00	0.00	0.00
1,900.00	6.01	249.12	1,892.31	-54.10	-141.81	151.78	0.00	0.00	0.00
2,000.00	6.01	249.12	1,991.76	-57.83	-151.60	162.25	0.00	0.00	0.00
2,100.00	6.01	249.12	2,091.21	-61.56	-161.38	172.72	0.00	0.00	0.00
2,200.00	6.01	249.12	2,190.66	-65.29	-171.16	183.19	0.00	0.00	0.00
2,300.00	6.01	249.12	2,290.11	-69.02	-180.94	193.66	0.00	0.00	0.00
2,400.00	6.01	249.12	2,389.56	-72.75	-190.72	204.12	0.00	0.00	0.00
2,500.00	6.01	249.12	2,489.01	-76.48	-200.50	214.59	0.00	0.00	0.00
2,577.41	6.01	249.12	2,566.00	-79.37	-208.07	222.70	0.00	0.00	0.00
8 5/8"									
2,600.00	6.01	249.12	2,588.46	-80.22	-210.28	225.06	0.00	0.00	0.00
2,689.29	6.01	249.12	2,677.26	-83.55	-219.01	234.41	0.00	0.00	0.00
2,700.00	5.82	249.12	2,687.92	-83.94	-220.05	235.51	1.75	-1.75	0.00
2,800.00	4.07	249.12	2,787.54	-87.01	-228.10	244.13	1.75	-1.75	0.00
2,900.00	2.32	249.12	2,887.38	-89.00	-233.31	249.71	1.75	-1.75	0.00
3,000.00	0.57	249.12	2,987.34	-89.90	-235.67	252.23	1.75	-1.75	0.00
3,032.66	0.00	0.00	3,020.00	-89.96	-235.82	252.40	1.75	-1.75	0.00
3,100.00	0.00	0.00	3,087.34	-89.96	-235.82	252.40	0.00	0.00	0.00
3,200.00	0.00	0.00	3,187.34	-89.96	-235.82	252.40	0.00	0.00	0.00
3,300.00	0.00	0.00	3,287.34	-89.96	-235.82	252.40	0.00	0.00	0.00
3,400.00	0.00	0.00	3,387.34	-89.96	-235.82	252.40	0.00	0.00	0.00
3,500.00	0.00	0.00	3,487.34	-89.96	-235.82	252.40	0.00	0.00	0.00
3,600.00	0.00	0.00	3,587.34	-89.96	-235.82	252.40	0.00	0.00	0.00
3,700.00	0.00	0.00	3,687.34	-89.96	-235.82	252.40	0.00	0.00	0.00
3,800.00	0.00	0.00	3,787.34	-89.96	-235.82	252.40	0.00	0.00	0.00
3,900.00	0.00	0.00	3,887.34	-89.96	-235.82	252.40	0.00	0.00	0.00
4,000.00	0.00	0.00	3,987.34	-89.96	-235.82	252.40	0.00	0.00	0.00
4,100.00	0.00	0.00	4,087.34	-89.96	-235.82	252.40	0.00	0.00	0.00
4,200.00	0.00	0.00	4,187.34	-89.96	-235.82	252.40	0.00	0.00	0.00
4,300.00	0.00	0.00	4,287.34	-89.96	-235.82	252.40	0.00	0.00	0.00
4,400.00	0.00	0.00	4,387.34	-89.96	-235.82	252.40	0.00	0.00	0.00
4,500.00	0.00	0.00	4,487.34	-89.96	-235.82	252.40	0.00	0.00	0.00
4,600.00	0.00	0.00	4,587.34	-89.96	-235.82	252.40	0.00	0.00	0.00

Scientific Drilling
Rocky Mountain Operations

SDI
Planning Report

Anadarko Petroleum Corporation

Database:	EDM5000-RobertS-Local	**Local Co-ordinate Reference:**	Well NBU 922-30D3DS
Company:	Kerr McGee Oil and Gas Onshore LP	**TVD Reference:**	GL 4925' & KB 9' @ 4934.00ft (ASSUMED)
Project:	Uintah County, UT UTM12	**MD Reference:**	GL 4925' & KB 9' @ 4934.00ft (ASSUMED)
Site:	NBU 922-30D PAD	**North Reference:**	True
Well:	NBU 922-30D3DS	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	OH		
Design:	PLAN #1 PRELIMINARY		

Planned Survey

Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)
4,700.00	0.00	0.00	4,687.34	-89.96	-235.82	252.40	0.00	0.00	0.00
4,732.66	0.00	0.00	4,720.00	-89.96	-235.82	252.40	0.00	0.00	0.00
WASATCH									
4,800.00	0.00	0.00	4,787.34	-89.96	-235.82	252.40	0.00	0.00	0.00
4,900.00	0.00	0.00	4,887.34	-89.96	-235.82	252.40	0.00	0.00	0.00
5,000.00	0.00	0.00	4,987.34	-89.96	-235.82	252.40	0.00	0.00	0.00
5,100.00	0.00	0.00	5,087.34	-89.96	-235.82	252.40	0.00	0.00	0.00
5,200.00	0.00	0.00	5,187.34	-89.96	-235.82	252.40	0.00	0.00	0.00
5,300.00	0.00	0.00	5,287.34	-89.96	-235.82	252.40	0.00	0.00	0.00
5,400.00	0.00	0.00	5,387.34	-89.96	-235.82	252.40	0.00	0.00	0.00
5,500.00	0.00	0.00	5,487.34	-89.96	-235.82	252.40	0.00	0.00	0.00
5,600.00	0.00	0.00	5,587.34	-89.96	-235.82	252.40	0.00	0.00	0.00
5,700.00	0.00	0.00	5,687.34	-89.96	-235.82	252.40	0.00	0.00	0.00
5,800.00	0.00	0.00	5,787.34	-89.96	-235.82	252.40	0.00	0.00	0.00
5,900.00	0.00	0.00	5,887.34	-89.96	-235.82	252.40	0.00	0.00	0.00
6,000.00	0.00	0.00	5,987.34	-89.96	-235.82	252.40	0.00	0.00	0.00
6,100.00	0.00	0.00	6,087.34	-89.96	-235.82	252.40	0.00	0.00	0.00
6,200.00	0.00	0.00	6,187.34	-89.96	-235.82	252.40	0.00	0.00	0.00
6,300.00	0.00	0.00	6,287.34	-89.96	-235.82	252.40	0.00	0.00	0.00
6,400.00	0.00	0.00	6,387.34	-89.96	-235.82	252.40	0.00	0.00	0.00
6,500.00	0.00	0.00	6,487.34	-89.96	-235.82	252.40	0.00	0.00	0.00
6,600.00	0.00	0.00	6,587.34	-89.96	-235.82	252.40	0.00	0.00	0.00
6,700.00	0.00	0.00	6,687.34	-89.96	-235.82	252.40	0.00	0.00	0.00
6,800.00	0.00	0.00	6,787.34	-89.96	-235.82	252.40	0.00	0.00	0.00
6,900.00	0.00	0.00	6,887.34	-89.96	-235.82	252.40	0.00	0.00	0.00
7,000.00	0.00	0.00	6,987.34	-89.96	-235.82	252.40	0.00	0.00	0.00
7,100.00	0.00	0.00	7,087.34	-89.96	-235.82	252.40	0.00	0.00	0.00
7,200.00	0.00	0.00	7,187.34	-89.96	-235.82	252.40	0.00	0.00	0.00
7,300.00	0.00	0.00	7,287.34	-89.96	-235.82	252.40	0.00	0.00	0.00
7,373.66	0.00	0.00	7,361.00	-89.96	-235.82	252.40	0.00	0.00	0.00
MESAVERDE									
7,400.00	0.00	0.00	7,387.34	-89.96	-235.82	252.40	0.00	0.00	0.00
7,500.00	0.00	0.00	7,487.34	-89.96	-235.82	252.40	0.00	0.00	0.00
7,600.00	0.00	0.00	7,587.34	-89.96	-235.82	252.40	0.00	0.00	0.00
7,700.00	0.00	0.00	7,687.34	-89.96	-235.82	252.40	0.00	0.00	0.00
7,800.00	0.00	0.00	7,787.34	-89.96	-235.82	252.40	0.00	0.00	0.00
7,900.00	0.00	0.00	7,887.34	-89.96	-235.82	252.40	0.00	0.00	0.00
8,000.00	0.00	0.00	7,987.34	-89.96	-235.82	252.40	0.00	0.00	0.00
8,100.00	0.00	0.00	8,087.34	-89.96	-235.82	252.40	0.00	0.00	0.00
8,200.00	0.00	0.00	8,187.34	-89.96	-235.82	252.40	0.00	0.00	0.00
8,300.00	0.00	0.00	8,287.34	-89.96	-235.82	252.40	0.00	0.00	0.00
8,400.00	0.00	0.00	8,387.34	-89.96	-235.82	252.40	0.00	0.00	0.00
8,500.00	0.00	0.00	8,487.34	-89.96	-235.82	252.40	0.00	0.00	0.00
8,600.00	0.00	0.00	8,587.34	-89.96	-235.82	252.40	0.00	0.00	0.00
8,700.00	0.00	0.00	8,687.34	-89.96	-235.82	252.40	0.00	0.00	0.00
8,800.00	0.00	0.00	8,787.34	-89.96	-235.82	252.40	0.00	0.00	0.00
8,900.00	0.00	0.00	8,887.34	-89.96	-235.82	252.40	0.00	0.00	0.00
9,000.00	0.00	0.00	8,987.34	-89.96	-235.82	252.40	0.00	0.00	0.00
9,100.00	0.00	0.00	9,087.34	-89.96	-235.82	252.40	0.00	0.00	0.00
9,200.00	0.00	0.00	9,187.34	-89.96	-235.82	252.40	0.00	0.00	0.00
9,300.00	0.00	0.00	9,287.34	-89.96	-235.82	252.40	0.00	0.00	0.00
9,400.00	0.00	0.00	9,387.34	-89.96	-235.82	252.40	0.00	0.00	0.00
9,500.00	0.00	0.00	9,487.34	-89.96	-235.82	252.40	0.00	0.00	0.00
9,600.00	0.00	0.00	9,587.34	-89.96	-235.82	252.40	0.00	0.00	0.00

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Project:	Uintah County, UT UTM12	**MD Reference:**	GL 4925' & KB 9' @ 4934.00ft (ASSUMED)
Site:	NBU 922-30D PAD	**North Reference:**	True
Well:	NBU 922-30D3DS	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	OH		
Design:	PLAN #1 PRELIMINARY		

Planned Survey

Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)
9,609.66	0.00	0.00	9,597.00	-89.96	-235.82	252.40	0.00	0.00	0.00
PBHL_NBU 922-30D3DS									

Design Targets

Target Name - hit/miss target - Shape	Dip Angle (°)	Dip Dir. (°)	TVD (ft)	+N/-S (ft)	+E/-W (ft)	Northing (usft)	Easting (usft)	Latitude	Longitude
PBHL_NBU 922-30D3D - plan hits target center - Circle (radius 25.00)	0.00	0.00	9,597.00	-89.96	-235.82	14,533,518.08	2,063,604.51	40° 0' 38.408 N	109° 29' 19.410 W

Casing Points

Measured Depth (ft)	Vertical Depth (ft)	Name	Casing Diameter (in)	Hole Diameter (in)
2,577.41	2,566.00	8 5/8"	8.625	11.000

Formations

Measured Depth (ft)	Vertical Depth (ft)	Name	Lithology	Dip (°)	Dip Direction (°)
1,451.23	1,446.00	GREEN RIVER			
4,732.66	4,720.00	WASATCH			
7,373.66	7,361.00	MESAVERDE			

Kerr-McGee Oil & Gas Onshore LP
PO Box 173779
Denver, CO 80217-3779

April 8, 2011

Ms. Diana Mason
Division of Oil, Gas and Mining
P.O. Box 145801
Salt Lake City, UT 84114-6100

Re: Directional Drilling R649-3-11
NBU 922-30D3DS
T9S-R22E
Section 30 NWNW (Surf), NWNW (Bottom)
Surface: 1226' FNL, 588' FWL
Bottom Hole: 1314' FNL, 352' FWL
Uintah County, Utah

Dear Ms. Mason:

Pursuant to the filing of Kerr-McGee Oil & Gas Onshore LP's (Kerr-McGee) Application for Permit to Drill regarding the above referenced well, we are hereby submitting this letter in accordance with Oil & Gas Conservation Rule R649-3-11 pertaining to Directional Drilling.

- Kerr-McGee's NBU 922-30D3DS is located within the Natural Buttes Unit area.
- Kerr-McGee is permitting this well as a directional well in order to minimize surface disturbance. Locating the well at the surface location and directionally drilling from this location, Kerr-McGee will be able to utilize the existing roads and pipelines in the area.
- Furthermore, Kerr-McGee certifies that it is the sole working interest owner within 460 feet of the entire directional well bore.

Therefore, based on the above stated information, Kerr-McGee Oil & Gas Onshore LP requests the permit be granted pursuant to R649-3-11.

Sincerely,

KERR-MCGEE OIL & GAS ONSHORE LP

Joe Matney

Joe Matney
Sr. Staff Landman

RECEIVED Jun. 15, 2011

Kerr-McGee Oil & Gas Onshore. L.P.

NBU 922-30D Pad

API #4304750644		**NBU 922-30C3S**		
	Surface:	1253 FNL / 663 FWL	NWNW	Lot 1
	BHL:	1381 FNL / 1985 FWL	SENW	Lot
API #		**NBU 922-30D1BS**		
	Surface:	1236 FNL / 616 FWL	NWNW	Lot 1
	BHL:	240 FNL / 771 FWL	NWNW	Lot 1
API #		**NBU 922-30D1CS**		
	Surface:	1243 FNL / 635 FWL	NWNW	Lot 1
	BHL:	569 FNL / 762 FWL	NWNW	Lot 1
API #4304750645		**NBU 922-30D3AS**		
	Surface:	1232 FNL / 607 FWL	NWNW	Lot 1
	BHL:	680 FNL / 382 FWL	NWNW	Lot 1
API #4304750655		**NBU 922-30D3DS**		
	Surface:	1226 FNL / 588 FWL	NWNW	Lot 1
	BHL:	1314 FNL / 352 FWL	NWNW	Lot 1
API #4304750656		**NBU 922-30E2AS**		
	Surface:	1246 FNL / 645 FWL	NWNW	Lot 1
	BHL:	1636 FNL / 352 FWL	SWNW	Lot 2
API #		**NBU 922-30F1BS**		
	Surface:	1249 FNL / 654 FWL	NWNW	Lot 1
	BHL:	1238 FNL / 1154 FWL	NENW	Lot

This Surface Use Plan of Operations (SUPO) or 13-point plan provides site-specific information for the above-referenced wells.

In accordance with Utah Oil & Gas Conservation Rule R649-3-11 pertaining to Directional Drilling, these wells will be directionally drilled. Refer to Topo Map A for directions to the location and Topo Maps A and B for location of access roads within a 2-mile radius.

An on-site meeting was held on May 5, 2011. Present were:

- David Gordon, Melissa Wardle, Karl Wright and Dan Emmett - BLM; and
- John Slaugh and Mitch Batty - Timberline Engineering & Land Surveying, Inc.; and
- Jacob Dunham - 609 Consulting, LLC; and
- Andy Lytle, Charles Chase, Ken Gathings, Roger Parry, Grizz Oleen, and Sheila Wopsock - Kerr-McGee

RECEIVED Jun. 15, 2011

A. Existing Roads:

Existing roads consist of county and improved/unimproved access roads (two-tracks). In accordance with Onshore Order #1, Kerr-McGee will, in accordance with BMPs, improve or maintain existing roads in a condition that is the same as or better than before operations began. New or reconstructed proposed access roads are discussed in Section B.

The existing roads will be maintained in a safe and usable condition. Maintenance for existing roads will continue until final abandonment and reclamation of well pads and/or other facilities, as applicable. Road maintenance will include, but is not limited to, blading, ditching, and/or culvert installation and cleanout. To ensure safe operating conditions, gravel surfacing will be performed where excessive rutting or erosion may occur. Dust control will be performed as necessary to ensure safe operating conditions.

Roads, gathering lines and electrical distribution lines will occupy common disturbance corridors where possible. Where available, roadways will be used as the staging area and working space for installation of gathering lines. All disturbances located in the same corridor will overlap each other to the maximum extent possible, while maintaining safe and sound construction and installation practices. Unless otherwise approved or requested in site specific documents, in no case will the maximum disturbance widths of the access road and utility corridors exceed the widths specified in Part D of this document.

Please refer to Topo B, for existing roads.

No segments require a ROW.

B. New or Reconstructed Access Roads:

All new or reconstructed roads will be located, designed, and maintained to meet the standards of the BLM. BMPs. Described in the BLM's Surface Operating Standards for Oil and Gas Exploration and Development, 4th Edition (Gold Book) (USDI and USDA, 2007) and/or BLM Manual Section 9113 (1985) will be considered in consultation with the BLM in the design, construction, improvement and maintenance of all new or reconstructed roads. If a new road would cross a water of the United States, Kerr-McGee will adhere to the requirements of applicable Nationwide Permits of the Department of Army Corps of Engineers.

Well pad or pad expansion may require construction of a new access road and/or de-commissioning of an older road. Plans, routes, and distances for new roads and road improvements are provided in design packages, exhibits and maps for a project. Project-specific maps are submitted to depict the locations of existing, proposed, and/or decommissioned and include the locations for supporting structures, including, but not limited to, culverts, bridges, low water crossings, range infrastructure, and haul routes, as per OSO 1. Designs for cuts and fills, including spoils source and storage areas, are provided with the road designs, as necessary.

As applicable, Kerr-McGee may use unimproved and/or two-track roads for lease operations, to lessen total disturbance.

Road designs will be based on the road safety requirements, traffic characteristics, environmental conditions, and the vehicles the road is intended to carry. Generally, newly constructed unpaved lease roads will be crowned and ditched with the running surfaces of the roads approximately 12-18 feet wide and a total road-utility corridor width not to exceed 45 feet, except where noted in the road design for a specific project. Maximum grade will generally not exceed 8%. Borrow ditches will be back sloped 3:1 or less. Construction BMPs will be employed to control onsite and offsite erosion.

Where topography would direct storm water runoff to an access road or well pad, drainage ditches or other common drainage control facilities, such as V- or wing-ditches, will be constructed to divert surface water runoff. Drainage features, including culverts, will be constructed or installed prior to commencing other operations, including drilling or facilities placement. Riprap will be placed at the inlet and outlet at the culvert(s) adjacent to the well pad, as necessary.

Prior to construction, new access road(s) will be staked according to the requirements of OSO 1. Construction activity will not be conducted using frozen or saturated materials or during periods when significant watershed damage (e.g. rutting, extensive sheet soil erosion, formation of rills/gullies, etc.) is likely to occur. Vegetative debris will not be placed in or under fill embankments.

New road maintenance will include, but is not limited to, blading, ditching, culvert installation and cleanout, gravel surfacing where excessive rutting or erosion may occur and dust control, as necessary to ensure safe operating conditions. All vehicular traffic, personnel movement, construction/restoration operations will be confined to the approved area and to existing roadways and/or access routes.

Snow removal will be conducted on an as-needed basis to accommodate safe travel. Snow removal will occur as necessary throughout the year, as will necessary drainage ditch construction. Removed snow may be stored on permitted well pads to reduce hauling distances and/or at the aerial extent of approved disturbance boundaries to facilitate snow removal for the remainder of the season.

If a county road crossing or encroachment permit is needed, it will be obtained prior to construction.

There are no new roads to be constructed.

C. Location of Existing Wells:

A) Refer to Topo Map C.

D. Location of Existing and/or Proposed Facilities:

This pad will expand the existing pad for the NBU 78, which is a producing gas well according to Utah Division of Oil, Gas and Mining (UDOGM) records on June 2, 2011. Gathering (pipeline) infrastructure will be utilized to collect and transport gas and fluids from the wells which are owned and operated by Kerr McGee Oil and Gas Onshore LP (Kerr-McGee).

Should the well(s) prove productive, production facilities will be installed on the disturbed portion of each well pad. A berm will be constructed completely around production components that contain fluids (i.e. production tanks, produced liquids tanks, but typically excluding dehy's and/or separators). The berms will generally be constructed of compacted subsoil or corrugated metal, and will hold the capacity of the largest tank and have sufficient freeboard to accomodate a 25 year rainfall event, and be independent of the back cut. This includes pumping units. Aboveground structures constructed or installed onsite for 6 months or longer will be painted a flat, non-reflective, earth-tone color chosen at the onsite in coordination with the BLM (typically Shadow Gray). A production facility layout is provided as part of a project-specific APD, ROW or NOS submission.

GAS GATHERING

Please refer to Exhibit A and Topo D- Pad and Pipeline Detail.

The gas gathering pipeline material: Steel line pipe. Surface = Bare pipe. Buried = Coated with fusion bonded epoxy coating (or equivalent). The total gas gathering pipeline distance from the meter to the tie in point is ±995' and the individual segments are broken up as follows:

The following segments are "onlease", no ROW needed.

±530' (0.10 miles) – Section 30 T09S R22E (NW/4 NW/4) – On-lease UTU0463, BLM surface, New 8" buried gas gathering pipeline from the meter to the edge of the pad. Please refer to Topo D2 - Pad and Pipeline Detail.

±465' (0.09 miles) – Section 30 T09S R22E (NW/4 NW/4) – On-lease UTU0463, BLM surface, New 8" buried gas gathering pipeline from the edge of the pad to the West Line of Section 30. Please refer to Exhibit A, Line 18.

LIQUID GATHERING

Please refer to Exhibit B and Topo D- Pad and Pipeline Detail.

The total liquid gathering pipeline distance from the separator to the tie in point is ±995' and the individual segments are broken up as follows:

The following segments are "onlease", no ROW needed.

±530' (0.10 miles) – Section 30 T09S R22E (NW/4 NW/4 – On-lease UTU0463, BLM surface, New 6" buried liquid gathering pipeline from the separator to the edge of the pad. Please refer to Topo D2 - Pad and Pipeline Detail.

±465' (0.09 miles) – Section 30 T09S R22E (NW/4 NW/4 – Lease UTU0463, BLM surface, New 6" buried liquid gathering pipeline from the edge of the pad to the West Line of Section 30. Please refer to Exhibit B, Line 21.

Pipeline Gathering Construction

Gathering (pipeline) infrastructure will be utilized to collect and transport gas and fluids from the wells which are owned and operated by Kerr-McGee. Gas gathering pipeline(s,) gas lift, or liquids pipelines may be constructed to lie on the surface or be buried. Where the pipeline is adjacent to the road or well pad, the road and/or well pad will be utilized for construction activities and staging. The area of disturbance during construction from the edge of road or well pad will typically be 30' in width. Where pipelines run cross country, the width of disturbance will typically be 45' for buried lines and 30' for surface lines. In addition, Kerr-McGee requests for a permanent 30' distrubance width that will be maintained for the portion adjacent to the road. The need for the 30' permanent distrubance width is for maintenance and repairs. Cross country permanent distrubance width also are required to be 30'.

Above-ground installation will generally not require clearing of vegetation or blading of the surface, except where safety considerations necessitate earthwork. In some surface pipeline installation instances pipe cannot be constructed where it will lay. In these cases where an above-ground pipeline is constructed parallel and adjacent to a road, it will be welded/fused on the road and then lifted from the road to the pipeline route. In other cases where a pipeline route is not parallel and adjacent to a road (cross-country between sites), it will be welded/fused in place at a well pad, access road, or designated work area and pulled between connection locations with a suitable piece of equipment.

Buried pipelines will generally be installed parallel and adjacent to existing and/or newly constructed roads and within the permitted disturbance corridor. Buried pipelines may vary from 2 inches (typically fuel gas lines) to 24 inches (typically transportation lines) in diameter, but 6 to 16 inches is typical for a buried gas line. The diameter of liquids pipelines may vary from 2 inches to 12 inches, but 6 inches is the typical diameter. Gas lift lines may vary from 2 to 12 inches in diameter, but 6-inch diameter pipes are generally used for gas lift. If all three lines are present (gas gathering, gas lift, and fluids), they will share a common trench where possible.

Typically, to install a buried pipeline, topsoil will be removed, windrowed and placed on the non-working side of the route for later reclamation. Because working room is limited, the spoil may be spread out across the working side and construction will take place on the spoil. The working side of the corridor will be used for pipe stringing, bending, welding and equipment travel. Small areas on the working side displaying ruts or uneven ground will be groomed to facilitate the safe passage of equipment. After the pipelines are installed, spoil will be placed back into the trench, and the topsoil will be redistributed over the disturbed corridor prior to final reclamation. Typical depth of the trench will be 6 feet, but depths may vary according to site-specific conditions (presence of bedrock, etc.). The proposed trench width for the pipeline would range from 18-48 inches.

The pipeline will be welded along the proposed route and lowered into place. Trenching equipment will cut through the soil or into the bedrock and create good backfill, eliminating the need to remove large rocks. The proposed buried pipeline will be visually and radiographically inspected and the entire pipeline will be pneumatically or hydrostatically tested before being placed into service. Routine vehicle traffic will be prevented from using pipeline routes as travel ways by posting signs at the route's intersection with an access road.

The liquid gathering lines will be made of polyethylene or a composite polyethylene/steel or polyethylene/fiberglass that is not subject to internal or external pipe corrosion. The content of the produced fluids to be transferred by the liquid gathering system will be approximately 92% produced water and 8% condensate. Trunk line valve connections for the water gathering system will be below ground but accessible from the surface in order to prevent freezing during winter time.

If pipelines or roads encounter a drainage that could be subject to flooding or surface water during extreme precipitation events, Kerr-McGee will apply all applicable Army Corps mandates as well as the BLM's Hydraulic Considerations for Pipeline Crossings of Stream Channels (BLM Technical Note 423, April 2007). In addition, all stream and drainage crossings will be evaluated to determine the need for stream alteration permits from the State of Utah Division of Water Rights and if necessary, required permits will be secured. Similarly, where a road or pipeline crossing exists the pipe will be butt welded and buried to a depth between 24 and 48 inches or more. Dirt roads will be cut and restored to a condition equivalent to the existing condition. All Uintah County road encroachment and crossing permits, where applicable, will be obtained prior to crossing construction. In no case will pressure testing of pipelines result in discharge of liquids to the surface. Please see site specific PODs and/or mapping materials for location of related facilities such as cathodic protection wells or pumping stations. Pipeline signs will be installed along the route to indicate the pipeline proximity, ownership, and to provide emergency contact phone numbers. Above ground valves, lateral T's, and/or cathodic protection wells will be installed at various locations for production integrity and safety purposes.

Upon completion of the proposed buried pipeline, the entire area of disturbance will be reclaimed to the standards proposed in the Green River District Reclamation Guidelines. Please refer to section J for more details regarding final reclamation.

When no longer deemed necessary by the operator, Kerr-McGee or it's successor will consult with the BLM, Vernal Field Office before terminating of the use of the pipeline(s).

The Anadarko Completions Transportation System (ACTS) information:

Please refer to Exhibit C for ACTs Lines

Upon completion of the wells on this pad, Kerr-McGee is also requesting to utilize the pit on this the proposed location as an Anadarko Completion Transport System (ACTS) staging pit which will be utilized for other completion operations in the area. The ACTS process will reduce the amount of truck traffic on a field-wide basis, also reducing vehicle emissions and fugitive dust generation.

Kerr-McGee will use ACTS to optimize the completion processes for multiple pads across the project area which may include up to a section of development. ACTS will facilitate management of frac fluids by utilizing existing reserve pits and temporary, surface-laid aluminum liquids transfer lines between frac locations. The pit will be refurbished as follows: mix and pile up drill cuttings with dry dirt, bury the original liner in the pit, walk bottom of pit with cat. Kerr-McGee will reline the pit with a 30 mil liner and double felt padding. The refurbished pit will be the same size or smaller as specified in the originally approved ROW/APD. The pit refurb will be done in a normal procedure and there will be no modification to the pit. Hog fence panels (5' X 16') will be built and painted shadow gray and will be put up on the work side of the pit. Polypropylene netting will be installed over all pits.

The collected hydrocarbons will be treated and sold at approved sales facilities. A loading rack with drip containment will be also be installed where water trucks would unload and load to prevent damage caused from pulling hoses in and out of the pit .

ACTS will require temporarily laying multiple 6" aluminum pipe water transfer lines on the surface between either existing or refurbished reserve pits. Please see the attached ACTS exhibit C for placement of the proposed temporary lines. The temporary aluminum transfer lines will be utilized to transport frac fluid being injected and/or recovered during the

completion process and will be laid adjacent to existing access roads or pipeline corridors. Upon completion of the frac operation, the liquids transfer lines will be flushed with fresh water and purged with compressed air. The contents of the transfer lines will be flushed into a water truck for delivery to another ACTS location or a reserve pit.

The volume of frac fluid transported through a water transfer line will vary, but volume is projected to be approximately 1.75 bbls per 50-foot joint. Although the maximum working pressure is 125 psig, the liquids transfer lines will be operated at a pressure of approximately 30 to 40 psig. Kerr-McGee requests to keep the netted pit open for one year from first production. During this time the surrounding well location completion fluids may be recycled in this pit and utilized for other frac jobs in the area. After one year Kerr-McGee will backfill the pit and reclaim. Kerr-McGee understands that due to the temporary nature of this system BLM considers this a casual use situation; therefore, no permanent ROW or temporary use plan will need to be issued by the BLM.

E. Location and Types of Water Supply:

Water for drilling and completion operations will be obtained from the following sources:

Permit # 49-2307	JD Field Services	Green River- Section 15, T2N, R22E
Permit # 49-2321	R.N. Industries	White River- Section 2, T10S, R24E
Permit # 49-2319	R.N. Industries	White River- Various Sources
Permit # 49-2320	R.N. Industries	Green River- Section 33, T8S, R23E

Water will be hauled to location over the roads marked on Maps A and B.

No water well is to be drilled on this lease.

F. Construction Materials:

Construction operations will typically be completed with native materials found on location. Construction materials that must be imported to the site (mineral material aggregate, soils or materials suitable for fill/surfacing) will be obtained from a nearby permitted source (described in site-specific documents). No construction materials will be removed from federal lands without prior approval from the BLM. A source location other than an on-location construction site will be designated either via a map or narrative within the project specific materials provided to the BLM.

G. Methods for Handling Waste:

All wastes subject to regulation will be handled in compliance with applicable laws to minimize the potential for leaks or spills to the environment. Kerr-McGee also maintains a Spill Control and Countermeasure Plan, which includes notification requirements, including the BLM, for all reportable spills of oil, produced liquids, and hazardous materials.

Any accidental release, such as a leak or spill in excess of the reportable quantity, as established by 40 CFR Part 117.3, will be reported as per the requirements of CERCLA, Section 102 B. If a release involves petroleum hydrocarbons or produced liquids, Kerr-McGee will comply with the notification requirements of NTL-3A. Drill cuttings and/or drilling fluids will be contained in the reserve/frac pit. Cuttings will be buried in pit(s) upon closure. Unless specifically approved by the BLM, no oil or other oil-based drilling additives, chromium/metals-based, or saline muds will be used during drilling. Only fresh water (as specified above), biodegradable polymer soap, bentonite clay, and/or non-toxic additives will be used in the mud system.

Pits will be constructed to minimize the accumulation of surface precipitation runoff into the pit (via appropriate placement of subsoil/topsoil storage areas and/or construction of berms, ditches, etc). Should unexpected liquid petroleum hydrocarbons (crude oil or condensate) be encountered during drilling, completions or well testing, liquid petroleum hydrocarbons will either be contained in test tanks on the well site or evacuated by vacuum trucks and transported to an approved disposal/ sales facility. Should petroleum hydrocarbons unexpectedly be released into a pit, they will be removed as soon as practical but in no case will they remain longer than 72 hours unless approved by the BLM. Should timely removal not be feasible, the pit will be netted as soon as practical. Similarly, hydrocarbon removal will take place prior to the closure of the pit, unless authorization is provided for disposal via alternate pit closure methods (e.g. solidification).

The reserve and/or fracture stimulation pit will be lined with an impermeable liner. The liner will be a synthetic material 30 mil or thicker. The bottom and side walls of the pit will be void of any sharp rocks that could puncture the liner. The liner will be installed over smooth fill subgrade that is free of pockets, loose rocks, or other materials (i.e. sand, sifted dirt, bentonite, straw, etc.) that could damage the liner. After evaporation and when dry, the reserve pit liners will be cut off, ripped and/or folded back (as safety considerations allow) as near to the mud surface as possible and buried on location or hauled to a landfill prior to backfilling the pit with a minimum of five feet of soil material.

Where necessary and if conditions (freeboard, etc.) allow, produced liquids from newly completed wells may be temporarily disposed of into pits for a period not to exceed 90 days as per Onshore Order Number 7 (OSO 7). Subsequently, permanent approved produced water disposal methods will be employed in accordance with OSO 7 and/or as described in a Water Management Plan (WMP). Otherwise, fluids disposal locations and associated haul routes, for ROW consideration, are typically depicted on Topo A of individual projects. Revisions to the water source or method of transportation will be subject to written approval from the BLM.

Any additional pits necessary for subsequent operations, such as temporary flare or workover pits, will be contained within the originally approved well pad and disturbance boundaries. Such temporary pits will be backfilled and reclaimed within 180 days of completion of work at a well location.

Pits containing drilling cuttings, mud, and/or completions fluids will be allowed to dry. Any free fluids remaining after six (6) months from reaching total depth, date of completion, and/or determination of inactivity will be removed (as weather conditions allow) to an approved site and the pit reclaimed. Additional drying methods may include fly-ash solidification or sprinkler evaporation. Installation and operation of any sprinklers, pumps, and equipment will ensure that water spray or mist does not drift.

No garbage or non-exempt substances as defined by Resource Conservation and Recovery Act (RCRA) subtitle C will be placed in the reserve pit. All refuse (trash and other solid waste including cans, paper, cable, etc.) generated during construction, drilling, completion, and well testing activities will be contained in an enclosed receptacle, removed from the drill locations promptly, and transported to an approved disposal facility. Immediately after removal of the drilling rig, all debris and other waste materials not contained within trash receptacles will be collected and removed from the well location.

For the protection of livestock and wildlife, all open pits (excluding flare pits) will be fenced to prevent wildlife or livestock entry. Total height of pit fencing will be at least 42 inches and corner posts will be cemented and/or braced in such a manner as to keep the fence tight at all times. Standard steel, wood, or pipe posts shall be used between the corner braces. Maximum distance between any 2 fence posts shall be no greater than 16 feet. Siphons, catchments, and absorbent pads will be installed to keep hydrocarbons produced by the drilling rig or other equipment on location from entering the reserve pit. Hydrocarbons, contaminated pads, and/or soils will be disposed of in accordance with state and federal requirements.

Portable, self-contained chemical toilets and/or sewage processing facilities will be provided for human waste disposal. Upon completion of operations, or as required, the toilet holding tanks will be pumped and the contents disposed of in an approved sewage disposal facility. All applicable regulations pertaining to disposal of human and solid waste will be observed.

Materials Management

Hazardous materials above reportable quantities will not be produced by drilling or completing proposed wells or constructing the pipelines/facilities. The term “hazardous materials” as used here means: (1) any substance, pollutant, or containment listed as hazardous under the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) of 1980, as amended 42 U.S.C. 9601 et seq., and the regulations issued under CERCLA; and (2) any hazardous waste as defined in RCRA of 1976, as amended. In addition, no extremely hazardous substance, as defined in 40 CFR 355, in threshold planning quantities, would be used, produced, stored, transported, or disposed of while producing any well.

Hazardous materials may be contained in some grease or lubricants, solvents, acids, paint, and herbicides, among others as defined above. Kerr-McGee maintains a file, per 29 CFR 1910.1200 (g), containing current Material Safety Data Sheets (MSDS) for all chemicals, compounds, and/or substances that are used during the course of construction, drilling, completion, and production operations for this project. The transport, use, storage and handling of hazardous materials will follow procedures specified by federal and state regulations. Transportation of hazardous materials to the well location is regulated by the Department of Transportation (DOT) under 49 CFR, Parts 171-180. DOT regulations pertain to the packing, container handling, labeling, vehicle placarding, and other safety aspects.

Potentially hazardous materials used in the development or operation of wells will be kept in limited quantities on well sites and at the production facilities for short periods of time. Chemicals meeting the criteria for being an acutely hazardous material/substance, or meet the quantities criteria per BLM Instruction Memorandum No. 93-344, will not be used.

Chemicals subject to reporting under Title III of the Superfund Amendments and Reauthorization Act (SARA) in quantities of 10,000 pounds or more may be produced and/or stored at production facilities and may be kept in limited quantities on drilling sites and well locations for short periods of time during drilling or completion activities.

Fluids disposal and pipeline/haul routes are depicted on Topo Map A.

Any produced water separated from recoverable condensate from the proposed well will be contained in a water tank and will then be transported by pipeline and/or truck to one of the pre-approved disposal sites:

RNI in Sec. 5 T9S R22E
NBU #159 in Sec. 35 T9S R21E
Ace Oilfield in Sec. 2 T6S R20E
MC&MC in Sec. 12 T6S R19E
Pipeline Facility in Sec. 36 T9S R20E
Goat Pasture Evaporation Pond in SW/4 Sec. 16 T10S R22E
Bonanza Evaporation Pond in Sec. 2 T10S R23E

Or to one of the following Kerr-McGee active Salt Water Disposal (SWD) wells:

NBU 159 SWD in Sec. 35 T9S R21E
CIGE 112D SWD in Sec. 19 T9S R21E
CIGE 114 SWD in Sec. 34 T9S R21E
NBU 921-34K SWD in Sec. 34 T9S R21E
NBU 921-33F SWD in Sec. 34 T9S R21E

H. Ancillary Facilities:

No additional ancillary facilities are planned for this location.

I. Well Site Layout:

The location, orientation and aerial extent of each drill pad; reserve/completion/flare pit; access road ingress/egress points, drilling rig, dikes/ditches, existing wells/infrastructure; proposed cuts and fills; and topsoil and spoil material stockpile locations are depicted on the exhibits for each project, where applicable. Site-specific conditions may require slight deviation in actual equipment and facility layout; however, the area of disturbance, as described in the survey, will not be exceeded.

For the protection of livestock and wildlife, all open pits and cellars will be fenced to prevent wildlife or livestock entry. Total height of pit fencing will be at least 42 inches and corner posts will be cemented and/or braced in such a manner as to keep the fence tight at all times. Standard steel, wood, or pipe posts shall be used between the corner braces. Maximum distance between any 2 fence posts shall be no greater than 16 feet.

Each well will utilize either a centralized tank battery, centralized fluids management system, or have tanks installed on its pad. Production tanks will be constructed, maintained, and operated to prevent unauthorized surface or subsurface discharges of liquids and to prevent livestock or wildlife entry. The tanks are not to be used for disposal of liquids from additional sources without prior approval of BLM.

Where produced liquids tanks are utilized, the tanks will be constructed, maintained, and operated to prevent unauthorized surface or subsurface discharges of liquids. The tanks will be fenced or capped to prevent livestock or wildlife entry. The tanks will be kept reasonably free from surface accumulations of liquid hydrocarbons. The tanks are not to be used for disposal of liquids from additional sources without the prior approval of the BLM.

J. Plans for Surface Reclamation:

The surface reclamation will be undertaken in two phases: interim and final. Interim reclamation is conducted following well completion and extends through the period of production. Interim reclamation is for the area of the well pad that is not required for production activities. Final reclamation is conducted following well plugging/conversion and/or facility abandonment processes.

Reclamation activities in both phases may include but is not limited to the re-contouring or re-configuration of topographic surfaces, restoration of drainage systems, segregation of spoils materials, minimizing surface disturbance, re-evaluating backfill requirements, pit closure, topsoil redistribution, soil treatments, seeding and weed control.

Interim Reclamation

Interim reclamation may include pit evaporation, fluid removal, pit solidification, re-contouring, ripping, spreading top soil, seeding, and/or weed control. Interim reclamation will be performed in accordance with OSO 1, or written notification will be provided to the BLM for approval. Where feasible, drilling locations, reserve pits, or access routes not utilized for production operations will be re-contoured to a natural appearance.

Interim re-contouring involves bringing all construction material from cuts and fills back onto the well pad and site and reestablishing the natural contours where desirable and practical. Fill and stockpiled spoils no longer necessary to the operation will be spread on the cut slopes and covered with stockpiled topsoil. All stockpiled top soils will be used for interim reclamation where practical to maintain soil viability. Where possible, the land surface will be left “rough” after re-contouring to ensure that the maximum surface area will be available to support the reestablishment of vegetative cover.

A reserve pit, upon being allowed to dry, will be backfilled and compacted with cover materials that are void of any topsoil, vegetation, large stones, rocks or foreign objects. Soils that are moisture laden, saturated, or partially/completely frozen will not be used for backfill or cover. The pit area will be mounded to allow for settling and to promote positive surface drainage away from the pit. Disposal of pit fluids and linings is discussed in Section G.

Final Reclamation

Final reclamation will be performed for unproductive wells and after the end of the life of a productive well. As soon as practical after the conclusion of drilling and testing operations, unproductive drill holes will be plugged and abandoned (P&A). Site and road reclamation will commence following plugging. In no case will reclamation at non-producing locations be initiated later than six (6) months from the date a well is plugged. A joint inspection of the disturbed area to be reclaimed may be requested by Kerr-McGee. The primary purpose of this inspection will be to review the existing conditions, or agree upon a revised final reclamation and abandonment plan. The BLM will be notified prior to commencement of reclamation operations. A Notice of Intent to Abandon will be filed for final recommendations regarding surface reclamation.

After plugging, all wellhead equipment that is no longer needed will be removed, and the well site will be reclaimed. Final contouring will blend with and follow as closely as practical the natural terrain and contours of the original site and surrounding areas. After re-contouring the site to the approximate contour that existed prior to pad construction, final grading will be conducted over the entire surface of the well site and access road. The area will be ripped to a depth of 18 to 24" on 18 to 24" centers, where practical. The surface soil material will be pitted with small depressions to form longitudinal depressions 12 to 18"deep, where practical. The entire area will be uniformly covered with the depressions constructed perpendicular to the natural flow of water.

Reclamation of roads will be performed at the discretion of the BLM. All unnecessary surface equipment and structures (e.g. cattle guards) and water control structures (e.g. culverts, drainage pipes) not needed to facilitate successful reclamation will be removed during final reclamation. Roads that will be reclaimed will be ripped to a depth of 18 inches where practical, re-contoured to approximate the original contour of the ground and seeded in accordance with the seeding specifications of the BLM.

Upon successfully completing reclamation of a P&A location, a Final Abandonment Notice will be submitted to the BLM.

Measures Common to Interim and Final Reclamation

Soil preparation will be conducted using a disk for areas in need of more soil preparation following site preparation. This will provide primary soil tillage to a depth no greater than 6 inches. Prior to reseeding, compacted areas will be scarified by ripping or chiseling to loosen compacted soils, promote water infiltration, and improve soil aeration and root penetration.

Seeding will occur year-round as conditions allow and will typically be accomplished through the use of a no-till rangeland style seed drill with a "picker box" in order to seed "fluffy" seed. Where drill seeding is not the preferred method, seed will be broadcast and then raked into the ground at double the rate of drill seeding. Seed mixes appropriate to the native plant community as determined and specified for each project location based on the site specific soils will be used for re-vegetation. The seed mixes will be selected from a list provided by or approved by the BLM, or a specific seed mix will be proposed by Kerr-McGee to the BLM and used after its approval. The selected specific seed mix for each well location and road segment will be utilized while performing interim and final reclamation for each project. All seed will be certified and tags will be maintained by Kerr-McGee. Every effort will be made to obtain "cheat grass free seed".

Seed Mix to be used for Well Site, Access Road, and Pipeline (as applicable):

Shadescale Mix	**e Live Seed lbs/acre**
Indian Ricegrass (Nezpar)	3
Sandberg bluegrass	0.75
Bottlebrush squirreltail	1
Great Basin Wildrye	0.5
Crested wheatgrass (Ephraim)	1.5
Winterfat	0.25
Shadscale	1.5
Four-wing saltbush	0.75
Forage Kochia	0.25
Total	9.5

Additional soil amendments and/or stabilization may be required on sites with poor soils and/or excessive erosion potential. Where severe erosion can become a problem and/or the use of machinery is not practical, seed will be hand broadcast and raked with twice the specified amount of seed. Slopes will be stabilized using materials specifically designed to prevent erosion on steep slopes and hold seed in place so vegetation can become permanently established. These materials will include, but are not limited to: erosion control blankets, hydro-mulch, and/or bonded fiber matrix at a rate to achieve a minimum of 80 percent soil coverage. Soil amendments such as "Sustain" (an organic fertilizer that will be applied at the rate 1,800 – 2,100 lbs/acre with seed) may also be dry broadcast or applied with hydro-seeding equipment.

Weed Control

All weed management will be done in accordance with the Vernal BLM Surface Disturbance Weed Policy. Noxious weeds will be controlled, as applicable, on project areas. Monitoring and management of noxious and/or invasive weeds of concern will be completed annually until the project is deemed successfully reclaimed by the surface management agency and/or owner according to the Anadarko Integrated Weed Management Plan. Noxious weed infestations will be mapped using a GPS unit and submitted to the BLM with information required in the Vernal BLM Surface Disturbance Weed Policy. If herbicide is to be applied it will be done according to an approved Pesticide Use Permit (PUP), inclusive of applicable locations. All pesticide applications will be recorded using a Pesticide Application Record (PAR) and will be submitted along with a Pesticide Use Report (PUR) annually prior to Dec. 31.

Monitoring

Monitoring of reclaimed project areas will be completed annually during the growing season and actions to ensure reclamation success will be taken as needed. During the first two growing seasons an ocular methodology will be used to determine the success of the reclamation activities. During the 3rd growing season a 200 point line intercept (quantitative) methodology will be used to obtain basal cover. The goal is to have the reclaimed area reach 30% basal cover when compared to the reference site. If after three growing seasons the area has not reached 30% basal cover, additional reclamation activities may be necessary. Monitoring will continue until the reclaimed area reaches 75% basal cover of desirable vegetation when compared to the reference site. (Green River District Reclamation Guidelines)

All monitoring reports will be submitted electronically to the Vernal BLM in the form of a geo-database no later than March 31, of the calendar year following the data collection.

K. Surface/Mineral Ownership:

United States of America
Bureau of Land Management
170 South 500 East
Vernal, UT 84078
(435)781-4400

L. Other Information:

Onsite Specifics:

- Construction: 30 Mil Double Felt
- Existing surface gas gathering pipeline will be removed from location if no longer in service

Cultural and Paleontological Resources

All personnel are strictly prohibited from collecting artifacts, any paleontological specimens or fossils, and from disturbing any significant cultural resources in the area. If artifacts, fossils, or any culturally sensitive materials are exposed or identified in the area of construction, all construction operations that would affect the newly discovered resource will cease, and Kerr-McGee will provide immediate notification to the BLM.

Resource Reports:

A Class I literature survey was completed on February 11, 2011, by Montgomery Archaeological Consultants, Inc (MOAC). For additional details please refer to report MOAC 10-243b.

A paleontological reconnaissance survey was completed on February 02, 2011, by Intermountain Paleo-Consulting. For additional details please refer to report IPC #10-31.

Biological field survey was completed on June 22, 2010, by Grasslands Consulting, Inc (GCI). For additional details please refer to report GCI-396.

M. Lessee's or Operators' Representative & Certification:

Laura Abrams
Regulatory Analyst II
Kerr-McGee Oil & Gas Onshore LP
PO Box 173779
Denver, CO 80217-3779
(720) 929-6356

Tommy Thompson
General Manager, Drilling
Kerr-McGee Oil & Gas Onshore LP
PO Box 173779
Denver, CO 80217-3779
(720) 929-6724

Certification: All lease and/or unit operations will be conducted in such a manner that full compliance is made with all applicable laws, regulations, Onshore Oil and Gas Orders, the approved Plan of Operations, and any applicable Notice to Lessees.

The Operator will be fully responsible for the actions of its subcontractors. A complete copy of the approved "Application for Permit to Drill" will be furnished to the field representative(s) to ensure compliance and shall be on location during all construction and drilling operations.

Kerr-McGee Oil & Gas Onshore LP is considered to be the operator of the subject well. Kerr-McGee Oil & Gas Onshore LP agrees to be responsible under terms and conditions of the lease for the operations conducted upon leased lands.

Bond coverage pursuant to 43 CFR 3104 for lease activities is being provided by Bureau of Land Management Nationwide Bond WYB000291.

I hereby certify that I, or persons under my supervision, have inspected the proposed drill site and access route, that I am familiar with the conditions that currently exist; that I have full knowledge of the State and Federal laws applicable to this operation; that the statements made in this plan are, to the best of my knowledge, true and correct; and the work associated with the operations proposed herein will be performed in conformity with this APD package and the terms and conditions under which it is approved. I also certify that I, or the company I represent, am responsible for operations conducted under this application. These statements are subject to the provisions of 18 U.S.C. 1001 for the filing of false statements.

Laura Abrams

June 2, 2011
Date

STATE OF UTAH
DEPARTMENT OF NATURAL RESOURCES
DIVISION OF OIL, GAS, AND MINING

FORM 9

SUNDRY NOTICES AND REPORTS ON WELLS

Do not use this form for proposals to drill new wells, significantly deepen existing wells below current bottom-hole depth, reenter plugged wells, or to drill horizontal laterals. Use APPLICATION FOR PERMIT TO DRILL form for such proposals.

5.LEASE DESIGNATION AND SERIAL NUMBER: UTU 0463

6. IF INDIAN, ALLOTTEE OR TRIBE NAME:

7.UNIT or CA AGREEMENT NAME: NATURAL BUTTES

1. TYPE OF WELL Gas Well

8. WELL NAME and NUMBER: NBU 922-30D3DS

2. NAME OF OPERATOR: KERR-MCGEE OIL & GAS ONSHORE, L.P.

9. API NUMBER: 43047506550000

3. ADDRESS OF OPERATOR: P.O. Box 173779 1099 18th Street, Suite 600, Denver, CO, 80217 3779 **PHONE NUMBER:** 720 929-6515 Ext

9. FIELD and POOL or WILDCAT: NATURAL BUTTES

4. LOCATION OF WELL
FOOTAGES AT SURFACE: 1226 FNL 0588 FWL
QTR/QTR, SECTION, TOWNSHIP, RANGE, MERIDIAN: Qtr/Qtr: NWNW Section: 30 Township: 09.0S Range: 22.0E Meridian: S

COUNTY: UINTAH

STATE: UTAH

11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION		
✓ NOTICE OF INTENT Approximate date work will start: 10/20/2011	☐ ACIDIZE	☐ ALTER CASING	☐ CASING REPAIR
☐ SUBSEQUENT REPORT Date of Work Completion:	☐ CHANGE TO PREVIOUS PLANS	☐ CHANGE TUBING	☐ CHANGE WELL NAME
	☐ CHANGE WELL STATUS	☐ COMMINGLE PRODUCING FORMATIONS	☐ CONVERT WELL TYPE
	☐ DEEPEN	☐ FRACTURE TREAT	☐ NEW CONSTRUCTION
☐ SPUD REPORT Date of Spud:	☐ OPERATOR CHANGE	☐ PLUG AND ABANDON	☐ PLUG BACK
	☐ PRODUCTION START OR RESUME	☐ RECLAMATION OF WELL SITE	☐ RECOMPLETE DIFFERENT FORMATION
	☐ REPERFORATE CURRENT FORMATION	☐ SIDETRACK TO REPAIR WELL	☐ TEMPORARY ABANDON
☐ DRILLING REPORT Report Date:	☐ TUBING REPAIR	☐ VENT OR FLARE	☐ WATER DISPOSAL
	☐ WATER SHUTOFF	☐ SI TA STATUS EXTENSION	✓ APD EXTENSION
	☐ WILDCAT WELL DETERMINATION	☐ OTHER	OTHER:

12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.

Kerr-McGee Oil & Gas Onshore, L.P. (Kerr-McGee) respectfully requests an extension to this APD for the maximum time allowed. Please contact the undersigned with any questions and/or comments. Thank you.

Approved by the Utah Division of Oil, Gas and Mining

Date: 09/20/2011

By:

NAME (PLEASE PRINT)	PHONE NUMBER	TITLE
Danielle Piernot	720 929-6156	Regulatory Analyst
SIGNATURE N/A		**DATE** 9/19/2011

RECEIVED Sep. 19, 2011

The Utah Division of Oil, Gas, and Mining

- State of Utah
- Department of Natural Resources

Electronic Permitting System - Sundry Notices

Request for Permit Extension Validation Well Number 43047506550000

API: 43047506550000
Well Name: NBU 922-30D3DS
Location: 1226 FNL 0588 FWL QTR NWNW SEC 30 TWNP 090S RNG 220E MER S
Company Permit Issued to: KERR-MCGEE OIL & GAS ONSHORE, L.P.
Date Original Permit Issued: 10/20/2009

The undersigned as owner with legal rights to drill on the property as permitted above, hereby verifies that the information as submitted in the previously approved application to drill, remains valid and does not require revision. Following is a checklist of some items related to the application, which should be verified.

- **If located on private land, has the ownership changed, if so, has the surface agreement been updated?** ○ **Yes** ◉ **No**
- **Have any wells been drilled in the vicinity of the proposed well which would affect the spacing or siting requirements for this location?** ○ **Yes** ◉ **No**
- **Has there been any unit or other agreements put in place that could affect the permitting or operation of this proposed well?** ○ **Yes** ◉ **No**
- **Have there been any changes to the access route including ownership, or rightof- way, which could affect the proposed location?** ○ **Yes** ◉ **No**
- **Has the approved source of water for drilling changed?** ○ **Yes** ◉ **No**
- **Have there been any physical changes to the surface location or access route which will require a change in plans from what was discussed at the onsite evaluation?** ○ **Yes** ◉ **No**
- **Is bonding still in place, which covers this proposed well?** ◉ **Yes** ○ **No**

Signature: Danielle Piernot **Date:** 9/19/2011
Title: Regulatory Analyst **Representing:** KERR-MCGEE OIL & GAS ONSHORE, L.P.

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Form 3160-3
(August, 2007)

RECEIVED
AUG 25 2009
BLM

RECEIVED
JUN 26 2011
BLM, Vernal, Utah

FORM APPROVED
OMB NO. 1004-0137
Expires: July 31, 2010

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

APPLICATION FOR PERMIT TO DRILL OR REENTER

5. Lease Serial No.
UTU463

6. If Indian, Allottee or Tribe Name

1a. Type of Work: [X] DRILL [ ] REENTER

7. If Unit or CA Agreement, Name and No.
UTU63047A

1b. Type of Well: [ ] Oil Well [X] Gas Well [ ] Other [ ] Single Zone [X] Multiple Zone

8. Lease Name and Well No.
NBU 922-30D3DS

2. Name of Operator
KERR-MCGEE OIL & GAS ONSHORE LP

9. API Well No.
43-047-50655

3a. Address
P.O. BOX 173779
DENVER, CO 80202-3779

3b. Phone No. *(include area code)*
Andy Lytle 720-929-6100

10. Field and Pool, or Exploratory
NATURAL BUTTES

4. Location of well *(Report location clearly and In accordance with any State requirements.*)*

At surface NWNW Lot 1 1226 FNL 588 FWL Lat. 40.010881 Long. -109.488569

At proposed prod. zone NWNW Lot 1 1314 FNL 352 FWL Lat. 40.010634 Long. -109.489411

11. Sec.,T.,R.,M.,or Blk.and Survey or Area
30 T 9S R 22E

14. Distance in miles and direction from the nearest town or post office*
Approximately 42.1 Miles South of Vernal, Utah

12. County or Parish
UINTAH

13. State
UTAH

15. Distance from proposed* location to nearest property or lease line, ft. (Also to nearest drlg. unit line, if any)	16. No. of acres in lease	17. Spacing Unit dedicated to this well
352'	551	

18. Distance from proposed location* to nearest well, drilling, completed, applied for, on this lease, ft.	19. Proposed Depth	20. BLM/ BIA Bond No. on file
284'	9,610'	WYB000291

21. Elevations (Show whether DF. RT, GR, etc.)	22. Aproximate date work will start*	23. Estimated duration
4926' GR	12/1/2011	60-90 Days

24. Attachments

The following, completed in accordance with the requirements of Onshore Oil and Gas Order No. 1 shall be attached to this form:

1. Well plat certified by a registered surveyor.
2. A Drilling Plan.
3. A Surface Use Plan (if the location is on National Forest System Lands, the SUPO shall be filed with the appropriate Forest Service Office).
4. Bond to cover the operations unless covered by existing bond on file(see item 20 above).
5. Operator certification.
6. Such other site specific information and/ or plans as may be required by the authorized officer.

25. Signature	Name *(Printed/ Typed)*	Date
Title: Regulatory Analyst I	Andy Lytle	6/27/2011

Approved By *(Signature)*	Name *(Printed/ Typed)*	Date
Title: Assistant Field Manager Lands & Mineral Resources	Office: VERNAL FIELD OFFICE	OCT 03 2011

Application approval does not warrant or certify that the applicant holds legal or equitable title to those rights in the subject lease which would entitle the applicant to conduct operations thereon.

Conditions of approval, if any, are attached. **CONDITIONS OF APPROVAL ATTACHED**

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

Continued on page 2)

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OCT 12 2011
DIV. OF OIL, GAS & MINING

* *(Instructions on page 2)*

UDOGM

NOTICE OF APPROVAL

UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
VERNAL FIELD OFFICE
170 South 500 East VERNAL, UT 84078 (435) 781-440(

CONDITIONS OF APPROVAL FOR APPLICATION FOR PERMIT TO DRILL

Company:	**Kerr McGee Oil & Gas Onshore, LP**	**Location:**	**Lot 1, Sec. 30, T9S, R22E (S) Lot 1, Sec. 30, T9S, R22E (B)**
Well No:	**NBU 922-30D3DS**	**Lease No:**	**UTU-463**
API No:	**43-047-50655**	**Agreement:**	**Natural Buttes Unit**

OFFICE NUMBER: (435) 781-4400

OFFICE FAX NUMBER: (435) 781-3420

A COPY OF THESE CONDITIONS SHALL BE FURNISHED TO YOUR FIELD REPRESENTATIVE TO INSURE COMPLIANCE

All lease and/or unit operations are to be conducted in such a manner that full compliance is made with the applicable laws, regulations (43 CFR Part 3160), and this approved Application for Permit to Drill including Surface and Downhole Conditions of Approval. The operator is considered fully responsible for the actions of his subcontractors. A copy of the approved APD must be on location during construction, drilling, and completion operations. **This permit is approved for a two (2) year period, or until lease expiration, whichever occurs first. An additional extension, up to two (2) years, may be applied for by sundry notice prior to expiration.**

NOTIFICATION REQUIREMENTS

Location Construction (Notify Environmental Scientist)	-	Forty-Eight (48) hours prior to construction of location and access roads.
Location Completion (Notify Environmental Scientist)	-	Prior to moving on the drilling rig.
Spud Notice (Notify Petroleum Engineer)	-	Twenty-Four (24) hours prior to spudding the well.
Casing String & Cementing (Notify Supv. Petroleum Tech.)	-	Twenty-Four (24) hours prior to running casing and cementing all casing strings to: ut_vn_opreport@blm.gov.
BOP & Related Equipment Tests (Notify Supv. Petroleum Tech.)	-	Twenty-Four (24) hours prior to initiating pressure tests.
First Production Notice (Notify Petroleum Engineer)	-	Within Five (5) business days after new well begins or production resumes after well has been off production for more than ninety (90) days.

SURFACE USE PROGRAM
CONDITIONS OF APPROVAL (COAs)

- All new and replacement internal combustion gas field engines of less than or equal to 300 design-rated horsepower must not emit more than 2 gms of NO_x per horsepower-hour. This requirement does not apply to gas field engines of less than or equal to 40 design-rated horsepower.

- All and replacement internal combustion gas field engines of greater than 300 design rated horsepower must not emit more than 1.0 gms of NO_x per horsepower-hour.

- If there is an active Gilsonite mining operation within 2 miles of the well location, operator shall notify the Gilsonite operator at least 48 hours prior to any blasting during construction.

- If paleontological materials are uncovered during construction, the operator is to immediately stop work and contact the Authorized Officer (AO). A determination will be made by the AO as to what mitigation may be necessary for the discovered paleontologic material before construction can continue.

SITE SPECIFIC COAs

- Kerr McGee will adhere to all applicant committed conservation measures and conservation recommendations that are stated in the USFWS's "Final Biological Opinion for the Anadarko Petroleum Corporation Natural Buttes Unit and Bonanza Area Natural Gas Development Project.

- The operator will follow the Green River District Reclamation Guidelines for Reclamation.

- The operator will control noxious weeds along the well pad, access road, and the pipeline route by spraying or mechanical removal. On BLM administered land, a Pesticides Use Proposal (PUP) will be submitted and approved prior to the application of herbicides or pesticides or possibly hazardous chemicals.

DOWNHOLE PROGRAM
CONDITIONS OF APPROVAL (COAs)

SITE SPECIFIC DOWNHOLE COAs:

- A copy of Kerr McGee's Standard Operating Practices (SOP version: dated 7/17/08 and approved 7/28/08) shall be on location.

All provisions outlined in Onshore Oil & Gas Order #2 Drilling Operations shall be strictly adhered to. The following items are emphasized:

DRILLING/COMPLETION/PRODUCING OPERATING STANDARDS

- The spud date and time shall be reported orally to Vernal Field Office within 24 hours of spudding.
- Notify Vernal Field Office Supervisory Petroleum Engineering Technician at least 24 hours in advance of casing cementing operations and BOPE & casing pressure tests.
- All requirements listed in Onshore Order #2 III. E. Special Drilling Operations are applicable for air drilling of surface hole.
- Blowout prevention equipment (BOPE) shall remain in use until the well is completed or abandoned. Closing unit controls shall remain unobstructed and readily accessible at all times. Choke manifolds shall be located outside of the rig substructure.
- All BOPE components shall be inspected daily and those inspections shall be recorded in the daily drilling report. Components shall be operated and tested as required by Onshore Oil & Gas Order No. 2 to insure good mechanical working order. All BOPE pressure tests shall be performed by a test pump with a chart recorder and **NOT** by the rig pumps. Test shall be reported in the driller's log.
- BOP drills shall be initially conducted by each drilling crew within 24 hours of drilling out from under the surface casing and weekly thereafter as specified in Onshore Oil & Gas Order No. 2.
- Casing pressure tests are required before drilling out from under all casing strings set and cemented in place.
- No aggressive/fresh hard-banded drill pipe shall be used within casing.
- **Cement baskets shall not be run on surface casing.**

- The operator must report all shows of water or water-bearing sands to the BLM. If flowing water is encountered it must be sampled, analyzed, and a copy of the analyses submitted to the BLM Vernal Field Office.

- The operator must report encounters of all non oil & gas mineral resources (such as Gilsonite, tar sands, oil shale, trona, etc.) to the Vernal Field Office, in writing, within 5 working days of each encounter. Each report shall include the well name/number, well location, date and depth (from KB or GL) of encounter, vertical footage of the encounter and, the name of the person making the report (along with a telephone number) should the BLM need to obtain additional information.

- A complete set of angular deviation and directional surveys of a directional well will be submitted to the Vernal BLM office engineer within 30 days of the completion of the well.

- While actively drilling, chronologic drilling progress reports shall be filed directly with the BLM, Vernal Field Office on a weekly basis in sundry, letter format or e-mail to the Petroleum Engineers until the well is completed.

- A cement bond log (CBL) will be run from the production casing shoe to the top of cement and shall be utilized to determine the bond quality for the production casing. Submit a field copy of the CBL to this office.

- **Please submit an electronic copy of all other logs run on this well in LAS format to UT_VN_Welllogs@BLM.gov. This submission will supersede the requirement for submittal of paper logs to the BLM.**

- There shall be no deviation from the proposed drilling, completion, and/or workover program as approved. Safe drilling and operating practices must be observed. Any changes in operation must have prior approval from the BLM Vernal Field Office.

OPERATING REQUIREMENT REMINDERS:

- All wells, whether drilling, producing, suspended, or abandoned, shall be identified in accordance with 43 CFR 3162.6. There shall be a sign or marker with the name of the operator, lease serial number, well number, and surveyed description of the well.

- For information regarding production reporting, contact the Office of Natural Resources Revenue (ONRR) at www.ONRR.gov.

- Should the well be successfully completed for production, the BLM Vernal Field office must be notified when it is placed in a producing status. Such notification will be by written communication and must be received in this office by not later than the fifth business day following the date on which the well is placed on production. The notification shall provide, as a minimum, the following informational items:

    - Operator name, address, and telephone number.
    - Well name and number.
    - Well location (¼¼, Sec., Twn, Rng, and P.M.).
    - Date well was placed in a producing status (date of first production for which royalty will be paid).
    - The nature of the well's production, (i.e., crude oil, or crude oil and casing head gas, or natural gas and entrained liquid hydrocarbons).
    - The Federal or Indian lease prefix and number on which the well is located; otherwise the non-Federal or non-Indian land category, i.e., State or private.
    - Unit agreement and/or participating area name and number, if applicable.
    - Communitization agreement number, if applicable.

- Any venting or flaring of gas shall be done in accordance with Notice to Lessees (NTL) 4A and needs prior approval from the BLM Vernal Field Office.

- All undesirable events (fires, accidents, blowouts, spills, discharges) as specified in NTL 3A will be reported to the BLM, Vernal Field Office. Major events, as defined in NTL3A, shall be reported verbally within 24 hours, followed by a written report within 15 days. "Other than Major Events" will be reported in writing within 15 days. "Minor Events" will be reported on the Monthly Report of Operations and Production.

- Whether the well is completed as a dry hole or as a producer, "Well Completion and Recompletion Report and Log" (BLM Form 3160-4) shall be submitted not later than 30 days after completion of the well or after completion of operations being performed, in accordance with 43 CFR 3162.4-1. Two copies of all logs run, core descriptions, and all other surveys or data obtained and compiled during the drilling, workover, and/or completion operations, shall be filed on BLM Form 3160-4. Submit with the well completion report a geologic report including, at a minimum, formation tops, and a summary and conclusions. Also include deviation surveys, sample descriptions, strip logs, core data, drill stem test data, and results of production tests if performed. Samples (cuttings, fluid, and/or gas) shall be submitted only when requested by the BLM, Vernal Field Office.

- All off-lease storage, off-lease measurement, or commingling on-lease or off-lease, shall have prior written approval from the BLM Vernal Field Office.

- Oil and gas meters shall be calibrated in place prior to any deliveries. The BLM Vernal Field Office Petroleum Engineers will be provided with a date and time for the initial meter calibration and all future meter proving schedules. A copy of the meter calibration reports shall be submitted to the BLM Vernal Field Office. All measurement facilities will conform to the API standards for liquid hydrocarbons and the AGA standards for natural gas measurement. All measurement points shall be identified as the point of sale or allocation for royalty purposes.

- A schematic facilities diagram as required by Onshore Oil & Gas Order No. 3 shall be submitted to the BLM Vernal Field Office within 30 days of installation or first production, whichever occurs first. All site security regulations as specified in Onshore Oil & Gas Order No. 3 shall be adhered to. All product lines entering and leaving hydrocarbon storage tanks will be effectively sealed in accordance with Onshore Oil & Gas Order No. 3.

- Any additional construction, reconstruction, or alterations of facilities, including roads, gathering lines, batteries, etc., which will result in the disturbance of new ground, shall require the filing of a suitable plan and need prior approval of the BLM Vernal Field Office. Emergency approval may be obtained orally, but such approval does not waive the written report requirement.

- No location shall be constructed or moved, no well shall be plugged, and no drilling or workover equipment shall be removed from a well to be placed in a suspended status without prior approval of the BLM Vernal Field Office. If operations are to be suspended for more than 30 days, prior approval of the BLM Vernal Field Office shall be obtained and notification given before resumption of operations.

- Pursuant to Onshore Oil & Gas Order No. 7, this is authorization for pit disposal of water produced from this well for a period of 90 days from the date of initial production. A permanent disposal method must be approved by this office and in operation prior to the end of this 90-day period. In order to meet this deadline, an application for the proposed permanent disposal method shall be submitted along with any necessary water analyses, as soon as possible, but no later than 45 days after the date of first production. Any method of disposal which has not been approved prior to the end of the authorized 90-day period will be considered as an Incident of Noncompliance and will be grounds for issuing a shut-in order until an acceptable manner for disposing of said water is provided and approved by this office.

- Unless the plugging is to take place immediately upon receipt of oral approval, the Field Office Petroleum Engineers must be notified at least 24 hours in advance of the plugging of the well, in order that a representative may witness plugging operations. If a well is suspended or abandoned, all pits must be fenced immediately until they are backfilled. The "Subsequent Report of Abandonment" (Form BLM 3160-5) must be submitted within 30 days after the actual plugging of the well bore, showing location of plugs, amount of cement in each, and amount of casing left in hole, and the current status of the surface restoration.

BLM - Vernal Field Office - Notification Form

Operator KERR-McGEE OIL & GAS Rig Name/# BUCKET RIG
Submitted By SHEILA WOPSOCH Phone Number 435.781.7024
Well Name/Number NBU 922-30D3DS
Qtr/Qtr NWNW Section 30 Township 9S Range 22E
Lease Serial Number UTU-463
API Number 4304750655

Spud Notice – Spud is the initial spudding of the well, not drilling out below a casing string.

Date/Time 12/19/2011 0800 HRS AM ☑ PM ☐

Casing – Please report time casing run starts, not cementing times.

☑ Surface Casing
☐ Intermediate Casing
☐ Production Casing
☐ Liner
☐ Other

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DIV. OF OIL, GAS & MINING

Date/Time 01/12/2011 0800 HRS AM ☑ PM ☐

BOPE

☐ Initial BOPE test at surface casing point
☐ BOPE test at intermediate casing point
☐ 30 day BOPE test
☐ Other

Date/Time _____ _____ AM ☐ PM ☐

Remarks ESTIMATED DATE AND TIME. PLEASE CONTACT ~~LOVEL YOUNG AT 435.781.7051 FOR MORE~~

STATE OF UTAH
DEPARTMENT OF NATURAL RESOURCES
DIVISION OF OIL, GAS, AND MINING

FORM 9

5.LEASE DESIGNATION AND SERIAL NUMBER:
UTU 0463

SUNDRY NOTICES AND REPORTS ON WELLS

Do not use this form for proposals to drill new wells, significantly deepen existing wells below current bottom-hole depth, reenter plugged wells, or to drill horizontal laterals. Use APPLICATION FOR PERMIT TO DRILL form for such proposals.

6. IF INDIAN, ALLOTTEE OR TRIBE NAME:

7.UNIT or CA AGREEMENT NAME:
NATURAL BUTTES

1. TYPE OF WELL
Gas Well

8. WELL NAME and NUMBER:
NBU 922-30D3DS

2. NAME OF OPERATOR:
KERR-MCGEE OIL & GAS ONSHORE, L.P.

9. API NUMBER:
43047506550000

3. ADDRESS OF OPERATOR:
P.O. Box 173779 1099 18th Street, Suite 600, Denver, CO, 80217 3779

PHONE NUMBER:
720 929-6515 Ext

9. FIELD and POOL or WILDCAT:
NATURAL BUTTES

4. LOCATION OF WELL
FOOTAGES AT SURFACE:
1226 FNL 0588 FWL
QTR/QTR, SECTION, TOWNSHIP, RANGE, MERIDIAN:
Qtr/Qtr: NWNW Section: 30 Township: 09.0S Range: 22.0E Meridian: S

COUNTY:
UINTAH

STATE:
UTAH

11.
CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION		
☐ NOTICE OF INTENT Approximate date work will start:	☐ ACIDIZE	☐ ALTER CASING	☐ CASING REPAIR
	☐ CHANGE TO PREVIOUS PLANS	☐ CHANGE TUBING	☐ CHANGE WELL NAME
☐ SUBSEQUENT REPORT Date of Work Completion:	☐ CHANGE WELL STATUS	☐ COMMINGLE PRODUCING FORMATIONS	☐ CONVERT WELL TYPE
	☐ DEEPEN	☐ FRACTURE TREAT	☐ NEW CONSTRUCTION
	☐ OPERATOR CHANGE	☐ PLUG AND ABANDON	☐ PLUG BACK
✓ SPUD REPORT Date of Spud: 12/19/2011	☐ PRODUCTION START OR RESUME	☐ RECLAMATION OF WELL SITE	☐ RECOMPLETE DIFFERENT FORMATION
	☐ REPERFORATE CURRENT FORMATION	☐ SIDETRACK TO REPAIR WELL	☐ TEMPORARY ABANDON
	☐ TUBING REPAIR	☐ VENT OR FLARE	☐ WATER DISPOSAL
☐ DRILLING REPORT Report Date:	☐ WATER SHUTOFF	☐ SI TA STATUS EXTENSION	☐ APD EXTENSION
	☐ WILDCAT WELL DETERMINATION	☐ OTHER	OTHER:

12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.

MIRU PETE MARTIN BUCKET RIG. DRILLED 20" CONDUCTOR HOLE TO 40'. RAN 14" 36.7# SCHEDULE 10 PIPE. CMT W/28 SX READY MIX. SPUD WELL ON 12/19/2011 AT 0830 HRS.

NAME (PLEASE PRINT)	PHONE NUMBER	TITLE
Sheila Wopsock	435 781-7024	Regulatory Analyst
SIGNATURE		**DATE**
N/A		12/22/2011

STATE OF UTAH
DEPARTMENT OF NATURAL RESOURCES
DIVISION OF OIL, GAS AND MINING

FORM 6

ENTITY ACTION FORM

Operator: KERR McGEE OIL & GAS ONSHORE LP
Operator Account Number: N 2995
Address: 1368 SOUTH 1200 EAST
city VERNAL
state UT zip 84078
Phone Number: (435) 781-7024

Well 1

API Number	Well Name		QQ	Sec	Twp	Rng	County
4304750655	NBU 922-30D3DS		NWNW	30	9S	22E	UINTAH
Action Code	**Current Entity Number**	**New Entity Number**	**Spud Date**			**Entity Assignment Effective Date**	
B	99999	3900	12/19/2011			12/28/11	

Comments: MIRU PETE MARTIN BUCKET RIG. WSMVD
SPUD WELL ON 12/29/2011 AT 0830 HRS BHL=NWNW

Well 2

API Number	Well Name		QQ	Sec	Twp	Rng	County
4304750645	NBU 922-30D3AS		NWNW	30	9S	22E	UINTAH
Action Code	**Current Entity Number**	**New Entity Number**	**Spud Date**			**Entity Assignment Effective Date**	
B	99999	3900	12/19/2011			12/28/11	

Comments: MIRU PETE MARTIN BUCKET RIG. WSMVD
SPUD WELL ON 12/19/2011 AT 1200 HRS BHL=NWNW

Well 3

API Number	Well Name		QQ	Sec	Twp	Rng	County
4304751678	NBU 922-30D1BS		NWNW	30	9S	22E	UINTAH
Action Code	**Current Entity Number**	**New Entity Number**	**Spud Date**			**Entity Assignment Effective Date**	
B	99999	3900	12/19/2011			12/28/11	

Comments: MIRU PETE MARTIN BUCKET RIG. WSMVD
SPUD WELL ON 12/19/2011 AT 1530 HRS. BHL=NWNW

ACTION CODES:
- A - Establish new entity for new well (single well only)
- B - Add new well to existing entity (group or unit well)
- C - Re-assign well from one existing entity to another existing entity
- D - Re-assign well from one existing entity to a new entity
- E - Other (Explain in 'comments' section)

SHEILA WOPSOCK
Name (Please Print)
Signature
REGULATORY ANALYST
Title
12/22/2011
Date

(5/2000)

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DEC 27 2011
DIV. OF OIL, GAS & MINING

STATE OF UTAH
DEPARTMENT OF NATURAL RESOURCES
DIVISION OF OIL, GAS, AND MINING

FORM 9

SUNDRY NOTICES AND REPORTS ON WELLS

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5.LEASE DESIGNATION AND SERIAL NUMBER: UTU 0463

6. IF INDIAN, ALLOTTEE OR TRIBE NAME:

7.UNIT or CA AGREEMENT NAME: NATURAL BUTTES

1. TYPE OF WELL Gas Well

8. WELL NAME and NUMBER: NBU 922-30D3DS

2. NAME OF OPERATOR: KERR-MCGEE OIL & GAS ONSHORE, L.P.

9. API NUMBER: 43047506550000

3. ADDRESS OF OPERATOR: P.O. Box 173779 1099 18th Street, Suite 600, Denver, CO, 80217 3779 **PHONE NUMBER:** 720 929-6526

9. FIELD and POOL or WILDCAT: NATURAL BUTTES

4. LOCATION OF WELL
FOOTAGES AT SURFACE: 1226 FNL 0588 FWL
QTR/QTR, SECTION, TOWNSHIP, RANGE, MERIDIAN: Qtr/Qtr: NWNW Section: 30 Township: 09.0S Range: 22.0E Meridian: S

COUNTY: UINTAH

STATE: UTAH

11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION		
☐ NOTICE OF INTENT Approximate date work will start:	☐ ACIDIZE	☐ ALTER CASING	☐ CASING REPAIR
☐ SUBSEQUENT REPORT Date of Work Completion:	☐ CHANGE TO PREVIOUS PLANS	☐ CHANGE TUBING	☐ CHANGE WELL NAME
☐ SPUD REPORT Date of Spud:	☐ CHANGE WELL STATUS	☐ COMMINGLE PRODUCING FORMATIONS	☐ CONVERT WELL TYPE
✓ DRILLING REPORT Report Date: 1/10/2012	☐ DEEPEN	☐ FRACTURE TREAT	☐ NEW CONSTRUCTION
	☐ OPERATOR CHANGE	☐ PLUG AND ABANDON	☐ PLUG BACK
	☐ PRODUCTION START OR RESUME	☐ RECLAMATION OF WELL SITE	☐ RECOMPLETE DIFFERENT FORMATION
	☐ REPERFORATE CURRENT FORMATION	☐ SIDETRACK TO REPAIR WELL	☐ TEMPORARY ABANDON
	☐ TUBING REPAIR	☐ VENT OR FLARE	☐ WATER DISPOSAL
	☐ WATER SHUTOFF	☐ SI TA STATUS EXTENSION	☐ APD EXTENSION
	☐ WILDCAT WELL DETERMINATION	☐ OTHER	OTHER:

12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.

MIRU AIR RIG ON JAN. 7, 2012. DRILLED SURFACE HOLE TO 2784'. RAN SURFACE CASING AND CEMENTED. WELL IS WAITING ON ROTARY RIG. DETAILS OF CEMENT JOB WILL BE INCLUDED WITH WELL COMPLETION REPORT.

Accepted by the Utah Division of Oil, Gas and Mining
FOR RECORD ONLY
January 11, 2012

NAME (PLEASE PRINT)	PHONE NUMBER	TITLE
Jaime Scharnowske	720 929-6304	Regulartory Analyst
SIGNATURE N/A		**DATE** 1/11/2012

FEDERAL APPROVAL OF THIS ACTION IS NECESSARY

FORM 9

STATE OF UTAH
DEPARTMENT OF NATURAL RESOURCES
DIVISION OF OIL, GAS, AND MINING

5.LEASE DESIGNATION AND SERIAL NUMBER:
UTU 0463

SUNDRY NOTICES AND REPORTS ON WELLS

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7.UNIT or CA AGREEMENT NAME:
NATURAL BUTTES

1. TYPE OF WELL
Gas Well

8. WELL NAME and NUMBER:
NBU 922-30D3DS

2. NAME OF OPERATOR:
KERR-MCGEE OIL & GAS ONSHORE, L.P.

9. API NUMBER:
43047506550000

3. ADDRESS OF OPERATOR:
P.O. Box 173779 1099 18th Street, Suite 600, Denver, CO, 80217 3779

PHONE NUMBER:
720 929-6526

9. FIELD and POOL or WILDCAT:
NATURAL BUTTES

4. LOCATION OF WELL
FOOTAGES AT SURFACE:
1226 FNL 0588 FWL
QTR/QTR, SECTION, TOWNSHIP, RANGE, MERIDIAN:
Qtr/Qtr: NWNW Section: 30 Township: 09.0S Range: 22.0E Meridian: S

COUNTY:
UINTAH

STATE:
UTAH

11.
CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION		
✓ NOTICE OF INTENT Approximate date work will start: 1/17/2012	☐ ACIDIZE	☐ ALTER CASING	☐ CASING REPAIR
	✓ CHANGE TO PREVIOUS PLANS	☐ CHANGE TUBING	☐ CHANGE WELL NAME
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☐ SUBSEQUENT REPORT Date of Work Completion:	☐ DEEPEN	☐ FRACTURE TREAT	☐ NEW CONSTRUCTION
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☐ DRILLING REPORT Report Date:	☐ WATER SHUTOFF	☐ SI TA STATUS EXTENSION	☐ APD EXTENSION
	☐ WILDCAT WELL DETERMINATION	☐ OTHER	OTHER:

12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.

The Operator requests approval for changes in the drilling plan. Specifically, the Operator requests approval for a FIT wavier, closed loop drilling option, and a production casing change. All other aspects of the previously approved drilling plan will not change. Please see the attachment. Thank you.

Accepted by the Utah Division of Oil, Gas and Mining

Date: February 02, 2012

By: Dark K Quist

NAME (PLEASE PRINT)	PHONE NUMBER	TITLE
Jaime Scharnowske	720 929-6304	Regulartory Analyst
SIGNATURE		**DATE**
N/A		1/17/2012

RECEIVED: Jan. 17, 2012

Kerr-McGee Oil & Gas Onshore. L.P.

NBU 922-30D3DS

Surface:	1226 FNL / 588 FWL	NWNW
BHL:	1314 FNL / 352 FWL	NWNW

Section 30 T9S R22E

Uintah County, Utah
Mineral Lease: UTU-0463

ONSHORE ORDER NO. 1

DRILLING PROGRAM

1. & 2. **Estimated Tops of Important Geologic Markers:**
Estimated Depths of Anticipated Water, Oil, Gas, or Mineral Formations:

Formation	Depth	Resource
Uinta	0 - Surface	
Green River	1446'	
Birds Nest	1,753'	Water
Mahogany	2,116'	Water
Wasatch	4,720'	Gas
Mesaverde	7,361'	Gas
MVU2	8,272'	Gas
MVL1	8,817'	Gas
TVD	9,597'	
TD	9,610'	

3. **Pressure Control Equipment** (Schematic Attached)

Please refer to the attached Drilling Program

4. **Proposed Casing & Cementing Program:**

Please refer to the attached Drilling Program

5. **Drilling Fluids Program:**

Please refer to the attached Drilling Program

6. **Evaluation Program:**

Please refer to the attached Drilling Program

RECEIVED: Jan. 17, 2012

7. Abnormal Conditions:

Maximum anticipated bottom hole pressure calculated at 9597' TVD, approximately equals 6,142 psi (0.64 psi/ft = actual bottomhole gradient)

Maximum Anticipated Bottom Hole Pressure (MABHP) = Pore Pressure at TD

Maximum anticipated surface pressure equals approximately 4,017 psi (bottom hole pressure minus the pressure of a partially evacuated hole calculated at 0.22 psi/foot, per Onshore Order No. 2).

Per Onshore Order No. 2 - Max Anticipated Surf. Press.(MASP) = (Pore Pressure at next csg point-
(0.22 psi/ft-partial evac gradient x TVD of next csg point))

8. Anticipated Starting Dates:

Drilling is planned to commence immediately upon approval of this application.

9. Variances:

Please refer to the attached Drilling Program.
Onshore Order #2 – Air Drilling Variance

Kerr-McGee Oil & Gas Onshore LP (KMG) respectfully requests a variance to several requirements associated with air drilling outlined in Onshore Order 2

- Blowout Prevention Equipment (BOPE) requirements;
- Mud program requirements; and
- Special drilling operation (surface equipment placement) requirements associated with air drilling.

This Standard Operating Practices addendum provides supporting information as to why KMG current air drilling practices for constructing the surface casing hole should be granted a variance to Onshore Order 2 air drilling requirements.

The reader should note that the air rig is used only to construct a stable surface casing hole through a historically difficult lost circulation zone. A conventional rotary rig follows the air rig, and is used to drill and construct the majority of the wellbore.

More notable, KMG has used the air rig layout and procedures outlined below to drill the surface casing hole in approximately 675 wells without incident of blow out or loss of life.

Background

In a typical well, KMG utilizes an air rig for drilling the surface casing hole, an interval from the surface to surface casing depths, which varies in depth from 1,700 to 2,800 feet. The air rig drilling operation does not drill through productive or over pressured formations in KMG field, but does penetrate the Uinta and Green River Formations. The purpose of the air drilling operation is to overcome the severe loss circulation zone in the Green River known as the Bird's Nest while creating a stable hole for the surface casing. The surface casing hole is generally drilled to approximately 500 feet below the Bird's Nest.

Before the surface air rig is mobilized, a rathole rig is utilized to set and cement conductor pipe through a competent surface formation. Generally, the conductor is set at 40 feet. In some cases, conductor may be set deeper in areas that the surface formation is not found competent. This rig also drills the rat and mouse holes in preparation for the surface casing and production string drilling operations.

The air rig is then mobilized to drill the surface casing hole by drilling a 12 1/4 inch hole for the first 200 feet, then will drill a 11inch hole to just above the Bird's Nest interval with an air hammer. The hammer is then tripped and replaced with a 11 inch tri-cone bit. The tri-cone bit is used to drill to the surface casing point, approximately 500 feet below the loss circulation zone (Bird's Nest). The 8-5/8 inch surface casing is then run and cemented in place, thereby isolating the lost circulation zone.

KMG fully appreciates Onshore Order 2 well control and safety requirements associated with a typical air drilling operations. However, the requirements of Onshore Order 2 are excessive with respect to the air rig layout and drilling operation procedures that are currently in practice to drill and control the surface casing hole in KMG Fields.

Variance for BOPE Requirements
The air rig operation utilizes a properly lubricated and maintained air bowl diverter system which diverts the drilling returns to a six-inch blooie line. The air bowl is the only piece of BOPE equipment which is installed during drilling operations and is sufficient to contain the air returns associated with this drilling operation. As was discussed earlier, the drilling of the surface hole does not encounter any over pressured or productive zones, and as a result standard BOPE equipment should not be required. In addition, standard drilling practices do not support the use of BOPE on 40 feet of conductor pipe.

Variance for Mud Material Requirements
Onshore Order 2 also states that sufficient quantities of mud materials shall be maintained or readily accessible for the purpose of assuring adequate well control. Once again, the surface hole drilling operations does not encounter over pressured or productive intervals, and as a result there is not a need to control pressure in the surface hole with a mud system. Instead of mud, the air rigs utilize water from the reserve pit for well control, if necessary. A skid pump which is located near the reserve pit (see attachment) will supply the water to the well bore.

Variance for Special Drilling Operation (surface equipment placement) Requirements
Onshore Order 2 requires specific safety distances or setbacks for the placement of associated standard air drilling equipment, wellbore, and reserve pits. The air rigs used to drill the surface holes are not typical of an air rig used to drill a producing hole in other parts of the US. These are smaller in nature and designed to fit a KMG location. The typical air rig layout for drilling surface hole in the field is attached.

Typically the blooie line discharge point is required to be 100 feet from the well bore. In the case of a KMG well, the reserve pit is only 45 feet from the rig and is used for the drill cuttings. The blooie line, which transports the drill cuttings from the well to the reserve pit, subsequently discharges only 45 feet from the well bore.

Typically the air rig compressors are required to be located in the opposite direction from the blooie line and a minimum of 100 feet from the well bore. At the KMG locations, the air rig compressors are approximately 40 feet from the well bore and approximately 60 feet from the blooie line discharge due to the unique air rig design. The air compressors (see attachment) are located on the rig (1250 cfm) and

on a standby trailer (1170 cfm). A booster sits between the two compressors and boosts the output from 350 psi to 2000 psi. The design does put the booster and standby compressor opposite from the blooie line.

Lastly, Onshore Order 2 addresses the need for an automatic igniter or continuous pilot light on the blooie line. The air rig does not utilize an igniter as the surface hole drilling operation does not encounter productive formations.

Variance for FIT Requirements
KMG also respectfully requests a variance to Onshore Order 2, Section III, Part Bi, for the pressure integrity test (PIT, also known as a formation integrity test (FIT)). This well is not an exploratory well and is being drilled in an area where the formation integrity is well known. Additionally, when an FIT is run with the mud weight as required, the casing shoe frequently breaks down and causes subsequent lost circulation when drilling the entire depth of the well.

Conclusion
The air rig operating procedures and the attached air rig layout have effectively maintained well control while drilling the surface holes in KMG Fields. KMG respectfully requests a variance from Onshore Order 2 with respect to air drilling well control requirements as discussed above.

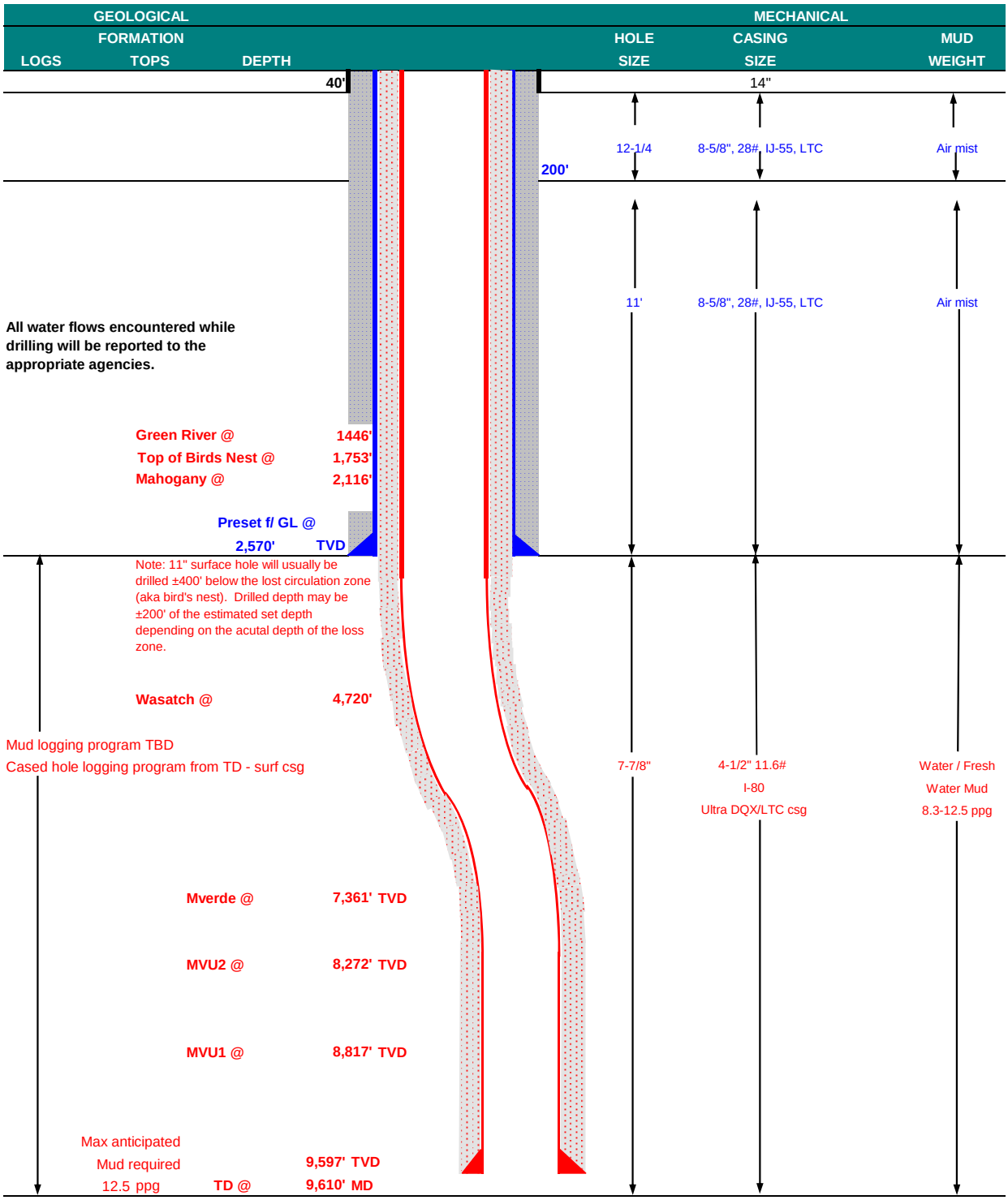
10. Other Information:

Please refer to the attached Drilling Program.

KERR-McGEE OIL & GAS ONSHORE LP

DRILLING PROGRAM

COMPANY NAME	KERR-McGEE OIL & GAS ONSHORE LP		DATE	January 16, 2012	
WELL NAME	**NBU 922-30D3DS**		TD	9,597' TVD	9,610' MD
FIELD	Natural Buttes	COUNTY Uintah	STATE Utah	FINISHED ELEVATION	4,925'
SURFACE LOCATION	NWNW 1226 FNL 588 FWL	Sec 30	T 9S	R 22E	
	Latitude: 40.010881	Longitude: -109.488569		NAD 83	
BTM HOLE LOCATION	NWNW 1314 FNL 352 FWL	Sec 30	T 9S	R 22E	
	Latitude: 40.010634	Longitude: -109.489411		NAD 83	
OBJECTIVE ZONE(S)	Wasatch/Mesaverde				
ADDITIONAL INFO	Regulatory Agencies: BLM (Minerals), BLM (Surface), UDOGM Tri-County Health Dept.				



KERR-McGEE OIL & GAS ONSHORE LP

DRILLING PROGRAM

CASING PROGRAM

	SIZE	INTERVAL			WT.	GR.	CPLG.	DESIGN FACTORS BURST	COLLAPSE	LTC	DQX TENSION
CONDUCTOR	14"	0-40'									
								3,390	1,880	348,000	N/A
SURFACE	8-5/8"	0	to	2,570	28.00	IJ-55	LTC	2.10	1.56	5.52	N/A
								7,780	6,350	223,000	267,000
PRODUCTION	4-1/2"	0	to	5,000	11.60	I-80	DQX	1.11	1.02		2.96
	4-1/2"	5,000	to	9,610'	11.60	I-80	LTC	1.11	1.02	5.15	

Surface Casing:

(Burst Assumptions: TD = 12.5 ppg) 0.73 psi/ft = frac gradient @ surface shoe

Fracture at surface shoe with 0.1 psi/ft gas gradient above

(Collapse Assumption: Fully Evacuated Casing, Max MW) (Tension Assumptions: Air Weight of Casing*Buoy.Fact. of water)

Production casing:

(Burst Assumptions: Pressure test with 8.4ppg @ 7000 psi) 0.64 psi/ft = bottomhole gradient

(Collapse Assumption: Fully Evacuated Casing, Max MW) (Tension Assumptions: Air Weight of Casing*Buoy.Fact. of water)

CEMENT PROGRAM

		FT. OF FILL	DESCRIPTION	SACKS	EXCESS	WEIGHT		YIELD
SURFACE	LEAD	500'	Premium cmt + 2% CaCl	180	60%	15.80		1.15
Option 1			+ 0.25 pps flocele					
	TOP OUT CMT (6 jobs)	1,200'	20 gals sodium silicate + Premium cmt	270	0%	15.80		1.15
			+ 2% CaCl + 0.25 pps flocele					
SURFACE			**NOTE: If well will circulate water to surface, option 2 will be utilized**					
Option 2	LEAD	2,070'	65/35 Poz + 6% Gel + 10 pps gilsonite	190	35%	11.00		3.82
			+ 0.25 pps Flocele + 3% salt BWOW					
	TAIL	500'	Premium cmt + 2% CaCl	150	35%	15.80		1.15
			+ 0.25 pps flocele					
	TOP OUT CMT	as required	Premium cmt + 2% CaCl	as req.		15.80		1.15
PRODUCTION	LEAD	4,220'	Premium Lite II +0.25 pps	330	35%	12.00		3.38
			celloflake + 5 pps gilsonite + 10% gel					
			+ 0.5% extender					
	TAIL	5,390'	50/50 Poz/G + 10% salt + 2% gel	1,270	35%	14.30		1.31
			+ 0.1% R-3					

*Substitute caliper hole volume plus 0% excess for LEAD if accurate caliper is obtained

*Substitute caliper hole volume plus 10% excess for TAIL if accurate caliper is obtained

FLOAT EQUIPMENT & CENTRALIZERS

SURFACE	Guide shoe, 1 jt, insert float. Centralize first 3 joints with bow spring centralizers. Thread lock guide shoe
PRODUCTION	Float shoe, 1 jt, float collar. 15 centralizers for a Mesaverde and 20 for a Blackhawk well. 1 centralizer on the first 3 joints and one every third joint thereafter.

ADDITIONAL INFORMATION

Test casing head to 750 psi after installing. Test surface casing to 1,500 psi prior to drilling out.

BOPE: 11" 5M with one annular and 2 rams. The BOPE will be installed before the production hole is drilled and tested to 5,000 psi (annular to 2,500 psi) prior to drilling out the surface casing shoe. Record on chart recorder and tour sheet. Function test rams on each trip. Maintain safety valve and inside BOP on rig floor at all times. Most rigs have top drives; however, if used, the Kelly is to be equipped with upper and lower kelly valves.

Surveys will be taken at 1,000' minimum intervals.

Most rigs have PVT System for mud monitoring. If no PVT is available, visual monitoring will be utilized.

DRILLING ENGINEER: _____ **DATE:** _____

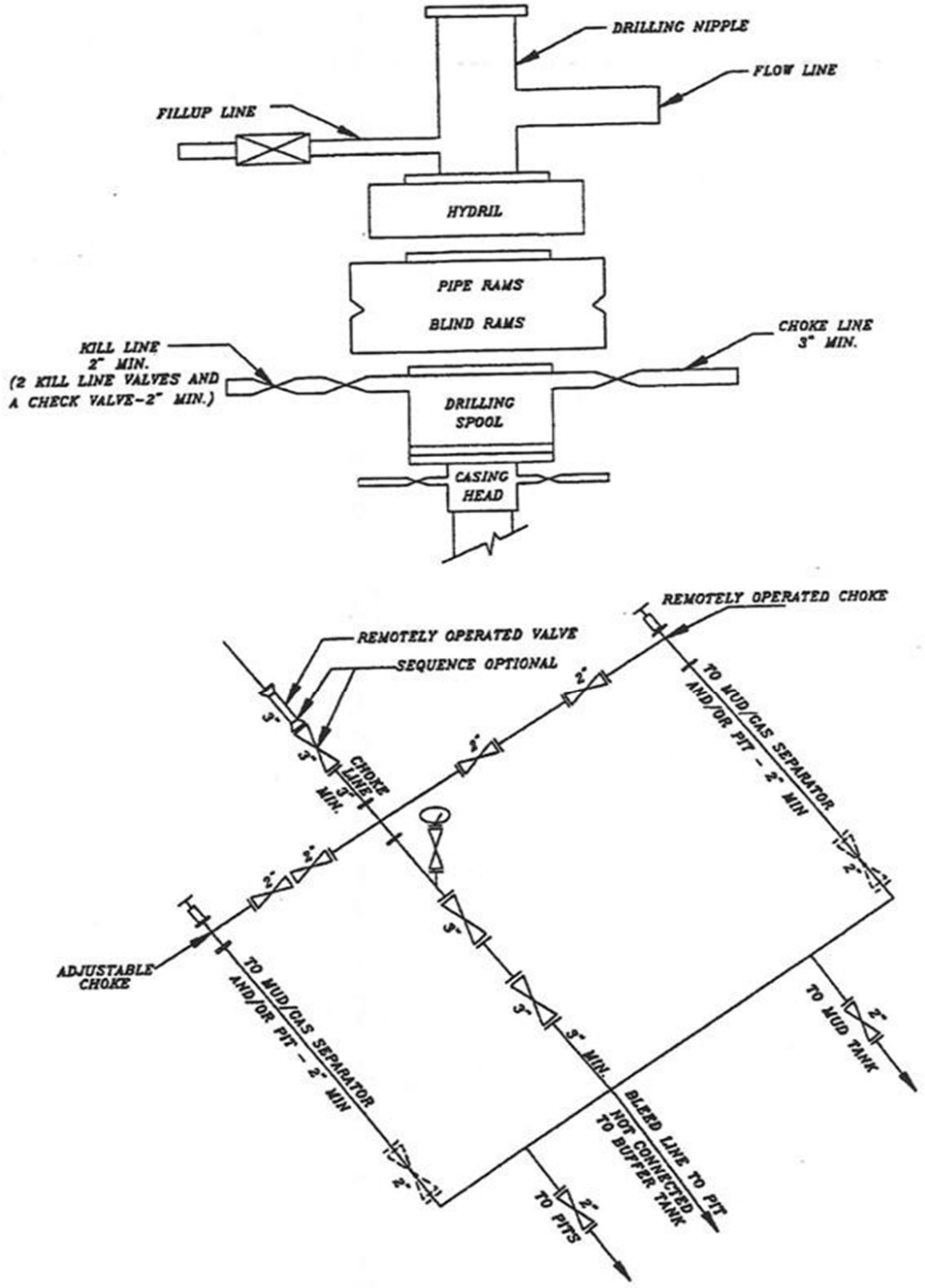
Nick Spence / Danny Showers / Chad Loesel

DRILLING SUPERINTENDENT: _____ **DATE:** _____

Kenny Gathings / Lovel Young

RECEIVED: Jan. 17, 2012

EXHIBIT A
NBU 922-30D3DS



SCHEMATIC DIAGRAM OF 5,000 PSI BOP STACK

Requested Drilling Options:

Kerr-McGee will use either a closed loop drilling system that will require one pit and one cuttings storage area to be constructed on the drilling pad or a traditional drilling operation with one pit used for drilling and completion operations. The cuttings storage area will be used to contain only the de-watered drill cuttings and will be lined and bermed to prevent any liquid runoff. The drill cuttings will be buried in the completion pit once completion operations are completed according to traditional pit closure standards. The pit will be constructed to allow for completion operations. The completion operations pit will be lined with a synthetic material 20 mil or thicker and will be used for the completing of the wells on the pad or used as part of our Aandarko Completions Transportation System (ACTS). Using the closed loop drilling system will allow Kerr-McGee to decrease the amount of disturbance/footprint on location compared to a single large drilling/completions pit.

If Kerr-McGee does not use a closed loop drilling system, it will construct a traditional drilling/completions pit to contain drill cuttings and for use in completion operations. The pit will be lined with a synthetic material 20 mil or thicker. The drill cuttings will be buried in the pit using traditional pit closure standards.

RECEIVED: Jan. 17, 2012

BLM - Vernal Field Office - Notification Form

Operator ANADARKO Rig Name/# ENSIGN 139
Submitted By KENNY MORRIS Phone Number 435- 828 - 0984
Well Name/Number NBU922-30D3DS

Qtr/Qtr NW/NW Section 30 Township 9S Range 22E
Lease Serial Number UTU0463
API Number 43047506550000

Spud Notice – Spud is the initial spudding of the well, not drilling out below a casing string.

Date/Time _____ _____ AM ☐ PM ☐

Casing – Please report time casing run starts, not cementing times.

☐ Surface Casing
☐ Intermediate Casing
☐ Production Casing
☐ Liner
☐ Other

RECEIVED
FEB 0 1 2012
DIV. OF OIL, GAS & MINING

Date/Time ___ ___ AM ☐ PM ☐

BOPE

☒ Initial BOPE test at surface casing point
☐ BOPE test at intermediate casing point
☐ 30 day BOPE test
☐ Other

Date/Time 2/1/2012 14:00 AM ☐ PM ☒

Remarks WILL TEST BOP ON FIRST WELL 1 OF 7 ON PAD ON WEDNESDAY 2/1/2012 NBU922-30D PAD ON RUNWAY ROAD

—

STATE OF UTAH
DEPARTMENT OF NATURAL RESOURCES
DIVISION OF OIL, GAS, AND MINING

FORM 9

SUNDRY NOTICES AND REPORTS ON WELLS

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7.UNIT or CA AGREEMENT NAME: NATURAL BUTTES

1. TYPE OF WELL Gas Well

8. WELL NAME and NUMBER: NBU 922-30D3DS

2. NAME OF OPERATOR: KERR-MCGEE OIL & GAS ONSHORE, L.P.

9. API NUMBER: 43047506550000

3. ADDRESS OF OPERATOR: P.O. Box 173779 1099 18th Street, Suite 600, Denver, CO, 80217 3779 **PHONE NUMBER:** 720 929-6515

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4. LOCATION OF WELL
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COUNTY: UINTAH

STATE: UTAH

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✓ DRILLING REPORT Report Date: 2/8/2012	☐ DEEPEN	☐ FRACTURE TREAT	☐ NEW CONSTRUCTION
	☐ OPERATOR CHANGE	☐ PLUG AND ABANDON	☐ PLUG BACK
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	☐ WILDCAT WELL DETERMINATION	☐ OTHER	OTHER:

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MIRU ROTARY RIG. FINISHED DRILLING FROM 2784' TO 9590' ON FEBRUARY 6, 2012. RAN 4-1/2" 11.6# I-80 PRODUCTION CASING. CEMENTED PRODUCTION CASING. RELEASED ENSIGN 139 RIG ON FEBRUARY 8, 2012 @ 04:00 HRS. DETAILS OF CEMENT JOB WILL BE INCLUDED WITH THE WELL COMPLETION REPORT. WELL IS WAITING ON FINAL COMPLETION ACTIVITIES.

Accepted by the Utah Division of Oil, Gas and Mining
FOR RECORD ONLY
February 09, 2012

NAME (PLEASE PRINT)	PHONE NUMBER	TITLE
Jaime Scharnowske	720 929-6304	Regulartory Analyst
SIGNATURE N/A		**DATE** 2/8/2012

RECEIVED: Feb. 08, 2012

STATE OF UTAH
DEPARTMENT OF NATURAL RESOURCES
DIVISION OF OIL, GAS, AND MINING

FORM 9

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COUNTY: UINTAH

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	☐ TUBING REPAIR	☐ VENT OR FLARE	☐ WATER DISPOSAL
	☐ WATER SHUTOFF	☐ SI TA STATUS EXTENSION	☐ APD EXTENSION
	☐ WILDCAT WELL DETERMINATION	☐ OTHER	OTHER:

12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.

THE SUBJECT WELL WAS PLACED ON PRODUCTION ON JUNE 12, 2012 AT 6:00 P.M. THE CHRONOLOGICAL WELL HISTORY WILL BE SUBMITTED WITH THE WELL COMPLETION REPORT.

Accepted by the Utah Division of Oil, Gas and Mining
FOR RECORD ONLY
June 20, 2012

NAME (PLEASE PRINT)	PHONE NUMBER	TITLE
Jenn Hawkins	720 929-6247	Staff Operations Specialist III
SIGNATURE N/A		**DATE** 6/13/2012

RECEIVED: Jun. 13, 2012

Form 3160-4
(August 2007)

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

FORM APPROVED
OMB No. 1004-0137
Expires: July 31, 2010

WELL COMPLETION OR RECOMPLETION REPORT AND LOG

5. Lease Serial No. UTU463

1a. Type of Well ☐ Oil Well ☒ Gas Well ☐ Dry ☐ Other
b. Type of Completion ☒ New Well ☐ Work Over ☐ Deepen ☐ Plug Back ☐ Diff. Resvr.
Other _____

6. If Indian, Allottee or Tribe Name

7. Unit or CA Agreement Name and No. UTU63047A

2. Name of Operator KERR MCGEE OIL & GAS ONSHORE LP Contact: CARA MAHLER E-Mail: cara.mahler@anadarko.com

8. Lease Name and Well No. NBU 922-30D3DS

3. Address 1099 18TH STREET, SUITE 1800 DENVER, CO 80202

3a. Phone No. (include area code) Ph: 720-929-6029

9. API Well No. 43-047-50655

4. Location of Well (Report location clearly and in accordance with Federal requirements)*

At surface NWNW 1226FNL 588FWL 40.010881 N Lat, 109.488569 W Lon

At top prod interval reported below NWNW 1299FNL 337FWL

At total depth NWNW 1314FNL 352FWL BHL by HSM

10. Field and Pool, or Exploratory NATURAL BUTTES

11. Sec., T., R., M., or Block and Survey or Area Sec 30 T9S R22E Mer SLB

12. County or Parish UINTAH

13. State UT

14. Date Spudded	15. Date T.D. Reached	16. Date Completed	17. Elevations (DF, KB, RT, GL)*
12/19/2011	02/06/2012	☐ D & A ☒ Ready to Prod. 06/12/2012	4925 GL

18. Total Depth:	MD 9590 TVD 9577	19. Plug Back T.D.:	MD 9543 TVD 9530	20. Depth Bridge Plug Set:	MD TVD

21. Type Electric & Other Mechanical Logs Run (Submit copy of each)
BHV-DSN/SD/ACTR-CBL/CMI/GR/CCL-RCBL/GR/CCL

22. Was well cored? ☒ No ☐ Yes (Submit analysis)
Was DST run? ☒ No ☐ Yes (Submit analysis)
Directional Survey? ☐ No ☒ Yes (Submit analysis)

23. Casing and Liner Record *(Report all strings set in well)*

Hole Size	Size/Grade	Wt. (#/ft.)	Top (MD)	Bottom (MD)	Stage Cementer Depth	No. of Sks. & Type of Cement	Slurry Vol. (BBL)	Cement Top*	Amount Pulled
20.000	14.000 STL	36.7	0	40		28			
11.000	8.625 IJ-55	28.0	0	2764		670		0	
7.875	4.500 I-80	11.6	0	9565		1661		420	

24. Tubing Record

Size	Depth Set (MD)	Packer Depth (MD)	Size	Depth Set (MD)	Packer Depth (MD)	Size	Depth Set (MD)	Packer Depth (MD)
2.375	8855							

25. Producing Intervals / 26. Perforation Record

	Formation	Top	Bottom	Perforated Interval	Size	No. Holes	Perf. Status
A)	WASATCH	6116	7342	6116 TO 7342	0.360	96	OPEN
B)	MESAVERDE	7426	9326	7426 TO 9326	0.360	168	OPEN
C)							
D)							

27. Acid, Fracture, Treatment, Cement Squeeze, Etc.

Depth Interval	Amount and Type of Material
6116 TO 9326	PUMP 12,352 BBLS SLICK H2O & 276,880 LBS 30/50 OTTAWA SAND

28. Production - Interval A

Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method
06/12/2012	06/20/2012	24	→	0.0	1837.0	412.0			FLOWS FROM WELL

Choke Size	Tbg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate	Oil BBL	Gas MCF	Water BBL	Gas:Oil Ratio	Well Status
20/64	1545	2273.0	→	0	1837	412		PGW

28a. Production - Interval B

Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method
			→						

Choke Size	Tbg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate	Oil BBL	Gas MCF	Water BBL	Gas:Oil Ratio	Well Status
			→					

(See Instructions and spaces for additional data on reverse side)

ELECTRONIC SUBMISSION #143366 VERIFIED BY THE BLM WELL INFORMATION SYSTEM
**** OPERATOR-SUBMITTED ** OPERATOR-SUBMITTED ** OPERATOR-SUBMITTED**

RECEIVED
JUL 25 2012
DIV. OF OIL, GAS & MINING

28b. Production - Interval C

Date First Produced	Test Date	Hours Tested	Test Production →	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method

Choke Size	Tbg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate →	Oil BBL	Gas MCF	Water BBL	Gas:Oil Ratio	Well Status

28c. Production - Interval D

Date First Produced	Test Date	Hours Tested	Test Production →	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method

Choke Size	Tbg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate →	Oil BBL	Gas MCF	Water BBL	Gas:Oil Ratio	Well Status

29. Disposition of Gas *(Sold, used for fuel, vented, etc.)*
SOLD

30. Summary of Porous Zones (Include Aquifers):

Show all important zones of porosity and contents thereof: Cored intervals and all drill-stem tests, including depth interval tested, cushion used, time tool open, flowing and shut-in pressures and recoveries.

31. Formation (Log) Markers

Formation	Top	Bottom	Descriptions, Contents, etc.	Name	Top Meas. Depth
				GREEN RIVER	1468
				BIRD'S NEST	1778
				MAHOGANY	2282
				WASATCH	4756
				MESAVERDE	7396

32. Additional remarks (include plugging procedure):
The first 210? of the surface hole was drilled with a 12 ?? bit. The remainder of surface hole was drilled with an 11? bit. P-110 DQX csg was run from surface to 5012?; LTC csg was run from 5012? to 9565?. Attached is the chronological well history, perforation report & final survey.

33. Circle enclosed attachments:

1. Electrical/Mechanical Logs (1 full set req'd.)
2. Geologic Report
3. DST Report
4. Directional Survey
5. Sundry Notice for plugging and cement verification
6. Core Analysis
7 Other:

34. I hereby certify that the foregoing and attached information is complete and correct as determined from all available records (see attached instructions):

Electronic Submission #143366 Verified by the BLM Well Information System.
For KERR MCGEE OIL & GAS ONSHORE L, sent to the Vernal

Name *(please print)* CARA MAHLER Title AUTHORIZED REPRESENTATIVE

Signature (Electronic Submission) Date 07/19/2012

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fradulent statements or representations as to any matter within its jurisdiction.

**** ORIGINAL ** ORIGINAL ** ORIGINAL ** ORIGINAL ** ORIGINAL ** ORIGINAL ** ORIGINAL ****

US ROCKIES REGION

Operation Summary Report

Well: NBU 922-30D3DS RED		Spud Date: 1/7/2012	
Project: UTAH-UINTAH	Site: NBU 922-30D PAD		Rig Name No: ENSIGN 139/139, PROPETRO 12/12
Event: DRILLING	Start Date: 11/21/2011		End Date: 2/8/2012
Active Datum: RKB @4,939.00usft (above Mean Sea Level)	UWI: NW/NW/0/9/S/22/E/30/0/0/26/PM/N/1226/W/0/588/0/0		

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation
1/7/2012	3:00 - 13:00	10.00	MIRU	01	A	P		MOVE RIG AND CAMPS 15 MILES WITH 2 J D FIELD SERVICE TRUCKS. MOVE RIG WITH 3 CDL DRIVER. RIG UP CAMPS W/ 2 MOUNTAIN WEST SWAMPERS. ENTIRE RIG ON LOCATION @ 13:00. RELEASE TRUCKS. (JD TRUCKS HAULED CAMPS, FRAC TANKS, PUMP , C-CANS, FUEL TANK. AND FORKLIFT.)
	13:00 - 15:00	2.00	MIRU	01	B	P		DRESS CONDUCTORS ON ALL 7 WELL'S. INSTALL DIVERTOR HEAD AND BOWIE LINE. BUILD DITCH. SPOT IN RIG. SPOT IN CATWALK AND PIPE RACKS. RIG UP PIT PUMP. RIG UP PUMP. PRIME PUMP. INSPECT RIG. READY
	15:00 - 15:30	0.50	PRPSPD	01	B	P		HELD PRE-SPUD SAFETY MEETING. TALKED ABOUT DESIGNATED SMOKING AREA. P/U 8" 1.83 BEND .17 RPG MUD MOTOR (3RD RUN) (SN 775-7407). M/U QD507 12.25" BIT (14TH RUN) (SN 7137067). TRIP IN TO SPUD.
	15:30 - 17:00	1.50	DRLSUR	02	D	P		SPUD 01/07/2012 15:30. DRILL 12.25" HOLE 44'-210'. (166', 83'/HR) GPM 400. DH RPM 68 RPM=45, WOB 5-15K. PSI ON/OFF 600/400. UP/DOWN/ ROT 20/20/20 K. DRAG 0 K. CIRC RESERVE W. 8.3# WATER. DRILL DOWN TO 210' W/ 6" COLLARS.
	17:00 - 18:30	1.50	DRLSUR	06	A	P		TRIP OUT. LAY DOWN 6" DRILL COLLARS, 12 1/4 BIT. CHECK BIT AND MOTOR. PICK UP Q506 11" BIT (10TH RUN) (SN 7019741) SCRIBE MOTOR. P/U 8" DIRECTIONAL ASSEMBLY AND SCRIBE. INSTALL EM TOOL. TRIP IN TO 210' TO DRILL AHEAD.
	18:30 - 0:00	5.50	DRLSUR	02	D	P		DRILL 11" HOLE ROTATE/SLIDE 210'-680' (470', 86'/HR) GPM 491. DH RPM 86 RPM=55, WOB 15-20K. PSI ON/OFF 1,125/890. UP/DOWN/ ROT 51/47/49 K. DRAG 2 K. CIRC RESERVE W. 8.3# WATER. NO LOSSES.
1/8/2012	0:00 - 4:30	4.50	DRLSUR	02	D	P		DRILL 11" HOLE ROTATE/SLIDE 680'-1,300' (620', 138'/HR) GPM 491. DH RPM 86 RPM=55, WOB 15-20K. PSI ON/OFF 1,390/1,122. UP/DOWN/ ROT 62/52/57 K. DRAG 5 K. CIRC RESERVE W. 8.3# WATER. NO LOSSES.
	4:30 - 13:00	8.50	DRLSUR	02	D	P		DRILL 11" HOLE ROTATE/SLIDE 1,300'-1850' (550', 67'/HR) GPM 491. DH RPM 86 RPM=55, WOB 15-20K. PSI ON/OFF 1,570/1,310. UP/DOWN/ ROT 75/61/69 K. DRAG 6 K. CIRC RESERVE W. 8.3# WATER. NO LOSSES. ANY THING MORE THAN 200 POUNDS OF DIFFERENTIAL PRESSURE AND THE MOTOR IS STALLING OUT, RATE OF PENETRATION IS ABNORMALLY LOW.
	13:00 - 14:00	1.00	DRLSUR	05	C	P		CIRCULATE AND CONDITION HOLE FOR TRIP.
	14:00 - 21:30	7.50	DRLSUR	06	A	P		TRIP OUT FOR BIT/BHA, PICK UP Q505FX BIT RUN # 1 (SN-7137184) PICK UP MOTOR (SN-775-77294), TRIP BACK TO BOTTOM TO DRILL AHEAD

US ROCKIES REGION

Operation Summary Report

Well: NBU 922-30D3DS RED			Spud Date: 1/7/2012
Project: UTAH-UINTAH	Site: NBU 922-30D PAD		Rig Name No: ENSIGN 139/139, PROPETRO 12/12
Event: DRILLING	Start Date: 11/21/2011		End Date: 2/8/2012
Active Datum: RKB @4,939.00usft (above Mean Sea Level)	UWI: NW/NW/0/9/S/22/E/30/0/0/26/PM/N/1226/W/0/588/0/0		

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation
	21:30 - 0:00	2.50	DRLSUR	02	D	P		DRILL 11" HOLE ROTATE/SLIDE 1850'-2030' (180', 72'/HR) GPM 491. DH RPM 86 RPM=55, WOB 15-20K. PSI ON/OFF 1,582/1,370. UP/DOWN/ ROT 75/61/69 K. DRAG 6 K. CIRC RESERVE W. 8.3# WATER. NO LOSSES.
1/9/2012	0:00 - 4:30	4.50	DRLSUR	02	D	P		DRILL 11" HOLE ROTATE/SLIDE 2,030'-2,360' (330', 73'/HR) GPM 491. DH RPM 86 RPM=55, WOB 15-20K. PSI ON/OFF 1,730/1,520. UP/DOWN/ ROT 79/65/70 K. DRAG 9 K. CIRC RESERVE W. 8.3# WATER. NO LOSSES.
	4:30 - 12:00	7.50	DRLSUR	02	D	P		DRILL 11" HOLE ROTATE/SLIDE 2,360'-2,784' (424', 61'/HR) TD @ 01/09/2012 12:00 GPM 491. DH RPM 86 RPM=55, WOB 15-20K. PSI ON/OFF 1,960/1,744. UP/DOWN/ ROT 86/70/79 K. DRAG 7 K. CIRC RESERVE W. 8.3# WATER. NO LOSSES. LAST SURVEY@ 2,719' INC-5.72 AZ-259.03 APPROXIMATLY 7' LOW OF THE LINE.
	12:00 - 14:00	2.00	DRLSUR	05	A	P		CIRCULATE AND CONDITION HOLE FOR CASING RUN.
	14:00 - 19:00	5.00	DRLSUR	06	D	P		LDDS NO TIGHT WHILE LAYING DOWN DRILL STRING. LAY DOWN DIRECTIONAL TOOLS. PULL MOTOR AND BREAK BIT. LAY DOWN MOTOR.
	19:00 - 20:30	1.50	DRLSUR	12	A	P		MOVE PIPE RACKS AND CATWALK. PULL DIVERTER HEAD. RIG UP TO RUN CSG. AND MOVE CSG INTO POSITION TO P/U.
	20:30 - 21:30	1.00	DRLSUR	08	A	Z		FIXING HYDRAULIC HOSE ON RIG.
	21:30 - 0:00	2.50	DRLSUR	12	C	P		HOLD SAFETY MEETING. RUN 62 JNT'S OF 8-5/8" 28# J-55 LTC CSG. LAND FLOAT SHOE @ 2753.99' KB. LAND BAFFLE PLATE @ 2707.95' KB. MADE FLOAT SHOE UP WITH THREAD LOCK. RAN 5 TOTAL CENTRALIZERS.
1/10/2012	0:00 - 2:00	2.00	DRLSUR	12	C	P		HOLD SAFETY MEETING. RUN 62 JNT'S OF 8-5/8" 28# J-55 LTC CSG. LAND FLOAT SHOE @ 2753.99' KB. LAND BAFFLE PLATE @ 2707.95' KB. MADE FLOAT SHOE UP WITH THREAD LOCK. RAN 5 TOTAL CENTRALIZERS.
	2:00 - 2:30	0.50	DRLSUR	12	B	P		HOLD SAFETY MEETING, RUN 200' OF 1". RIG DOWN RIG MOVE OFF WELL, REBUILD DITCH. RIG UP CEMENT TRUCK, 2" HARD LINES, CEMENT HEAD, LOAD PLUG.
	2:30 - 3:48	1.30	DRLSUR	12	E	P		PRESSURE TEST LINES TO 2000 PSI. PUMP 50 BBLS OF WATER AHEAD. MIX AND PUMP 20 BBLS OF 8.3# GEL WATER AHEAD. MIX AND PUMP (220 SX) 149.6 BBLS OF 11# 3.82 YD 23 GAL/SK HI FILL LEAD CEMENT. MIX AND PUMP (225 SX) 46 BBLS OF 15.8# 1.15 YD 5 GAL/SK PREMIUM CEMENT W/ 2% CALC. DROP PLUG ON FLY. DISPLACE W/ 168 BBLS OF H20. FULL CIRCULATION THROUGH OUT. LIFT OF 600 PSI AT 4 BBL/MIN. BUMP PLUG AT DISPLACEMENT VOLUME. LAND THE PLUG WITH 1100 PSI. SHUT DOWN HELD 1100 PSI FOR 5 MIN. TESTED FLOAT AND FLOAT HELD.

US ROCKIES REGION

Operation Summary Report

Well: NBU 922-30D3DS RED		Spud Date: 1/7/2012
Project: UTAH-UINTAH	Site: NBU 922-30D PAD	Rig Name No: ENSIGN 139/139, PROPETRO 12/12
Event: DRILLING	Start Date: 11/21/2011	End Date: 2/8/2012
Active Datum: RKB @4,939.00usft (above Mean Sea Level)	UWI: NW/NW/0/9/S/22/E/30/0/0/26/PM/N/1226/W/0/588/0/0	

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation
	3:48 - 6:30	2.70	DRLSUR	12	E	P		MIX AND PUMP (125 SX) 25.6 BBLS OF SAME TAIL CEMENT WITH 4% CALC DOWN 1" PIPE. SHUT DOWN AND CLEAN TRUCK. NO CEMENT TO SURFACE. WAIT 1.5 HOURS MIX AND PUMP (100 SX) 20.4 BBLS OF SAME TAIL CEMENT DOWN THE BACK SIDE WITH 5 BBLS CEMENT TO SURFACE CEMENT HOLDING AT SURFACE. SHUT DOWN CLEAN TRUCK AND RIG DOWN CEMENT CREW. RELEASE RIG @ 01/10/2012 06:30.
1/30/2012	12:00 - 0:00	12.00	RDMO	01	E	P		RDRT,PREP F/ MOVE,UNSTRING DERRICK,MOVE 1200 BBLS MUD,CONTINUE TO RDRT
1/31/2012	0:00 - 7:00	7.00	RDMO	01	E	P		RDRT PREP F/ TRUCKS,100% READY
	7:00 - 17:00	10.00	MIRU	01	A	P		TRUCK 13 MILES TO 922-30D3DS WITH RW JONES,10 TRUCK & 2 FORKLIFTS,RELEASE TRUCKS 17:00,,1/31/2012
	17:00 - 0:00	7.00	MIRU	01	B	P		RURT,SET IN BACK YARD,STRING UP BLOCKS,RAISE DERRICK@20:00,RIG UP NOV BRANT,HAUL WATER F/ RIG TANK & BOILER,CONTINUE RURT THRU THE NIGHT
2/1/2012	0:00 - 10:00	10.00	MIRU	01	B	P		R.U.R.T - SET IN CATWALK - R/U RIG FLOOR
	10:00 - 11:00	1.00	DRLPRO	14	A	P		N/U B.O.P'S
	11:00 - 15:00	4.00	DRLPRO	15	A	P		TEST B.O.P'S
	15:00 - 15:30	0.50	DRLPRO	14	B	P		INSTALL WEAR BUSHING
	15:30 - 22:30	7.00	DRLPRO	06	A	P		P/U MOTOR - BIT - DIR TOOLS & BHA & D.P - TAG CEMENT @ 2710
	22:30 - 0:00	1.50	DRLPRO	02	F	P		DRILL SHOE TRACK
2/2/2012	0:00 - 7:00	7.00	DRLPRO	02	D	P		SPUD 7.875 HOLE DIR DRILL F/ 2794 TO 3661 - 867' @ 123.8 FPH ,WOB18/20,RPM 38/118,GPM 514,105 STKS,4/8K TORQ,PSI 1350/1700,SLIDE 130' 16%
	7:00 - 7:30	0.50	DRLPRO	07	A	P		RIG SER
	7:30 - 0:00	16.50	DRLPRO	02	D	P		DIR DRILL F/ 3661 TO 5516 - 1855' @ 112.4 FPH ,WOB18/20,RPM 38/118,GPM 514,105 STKS,4/8K TORQ,PSI 1350/1700,SLIDE 207 ' 11%
2/3/2012	0:00 - 14:00	14.00	DRLPRO	02	D	P		DIR DRILL F/ 5516 TO 6784 - 1268' @ 90.5 FPH ,WOB18/20,RPM 38/118,GPM 514,105 STKS,4/8K TORQ,PSI 1350/1700,SLIDE 108 ' 8.5%
	14:00 - 14:30	0.50	DRLPRO	07	A	P		RIG SER
	14:30 - 0:00	9.50	DRLPRO	02	D	P		DIR DRILL F/ 6784 TO 7507 - 723' @ 76.1 FPH ,WOB18/20,RPM 38/118,GPM 514,105 STKS,4/8K TORQ,PSI 1350/1700,SLIDE 50 ' 7% MUD UP STSTEM - 9.3 PPG 33 VIS
2/4/2012	0:00 - 12:30	12.50	DRLPRO	02	D	P		DIR DRILL F/ 7507 TO 8321 - 814' @ 65.12 FPH ,WOB18/20,RPM 38/107,GPM 465,95 STKS,4/8K TORQ,PSI 1800/2150,SLIDE 100' 12% MUD WT 10.7 PPG 38 VIS (PUMPED LCM SWEEPS TRY TO CONTROL LOSES & BYPASS SHAKERS @ 8180 WELL SEEPING LOST 400 BBLS TOTAL - RAISE LCM TO 8%
	12:30 - 13:00	0.50	DRLPRO	07	A	P		SER RIG
	13:00 - 0:00	11.00	DRLPRO	02	D	P		DIR DRILL F/ 8321 TO 8865 - 544' @ 49.4 FPH ,WOB18/20,RPM 38/107,GPM 465,95 STKS,4/8K TORQ,PSI 1800/2150,SLIDE 50 ' 10% MUD WT 11.4 PPG 40 VIS LCM 15%

US ROCKIES REGION

Operation Summary Report

Well: NBU 922-30D3DS RED			Spud Date: 1/7/2012
Project: UTAH-UINTAH	Site: NBU 922-30D PAD		Rig Name No: ENSIGN 139/139, PROPETRO 12/12
Event: DRILLING	Start Date: 11/21/2011		End Date: 2/8/2012
Active Datum: RKB @4,939.00usft (above Mean Sea Level)	UWI: NW/NW/0/9/S/22/E/30/0/0/26/PM/N/1226/W/0/588/0/0		

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation
2/5/2012	0:00 - 7:00	7.00	DRLPRO	02	D	P		DIR DRILL F/ 8865 TO 9040 -175 ' @ 25.0 FPH ,WOB18/20,RPM 38/107,GPM 465,95 STKS,4/8K TORQ,PSI 1800/2150,SLIDE 0 ' 0% MUD WT 11.5 PPG 40 VIS LCM 15%
	7:00 - 8:00	1.00	DRLPRO	05	A	P		CIRC BTM UP & BIULD DRY PILL
	8:00 - 15:00	7.00	DRLPRO	06	A	P		T.O.H F/ BIT & MOTOR (PULL 5 STANDS NO PUMP OR ROT) PUMP DRY PILL & CONT T.O.H (TIGHT SPOT @ 4698
	15:00 - 0:00	9.00	DRLPRO	06	A	P		C/O BIT & MOTOR & T.I.H
2/6/2012	0:00 - 0:30	0.50	DRLPRO	03	E	P		WASH 90' TO BTM (NO FILL)
	0:30 - 9:30	9.00	DRLPRO	02	D	P		DIR DRILL F/ 9040 TO 9590 - 550 '@ 61.1 FPH ,WOB18/20,RPM 40/65,GPM 465,95 STKS,4/8K TORQ,PSI 2050/2400,SLIDE 0 ' 0% MUD WT 11.8 PPG 41 VIS LCM 12%
	9:30 - 10:00	0.50	DRLPRO	07	A	P		SER RIG
	10:00 - 11:00	1.00	DRLPRO	05	A	P		CIRC BTM UP
	11:00 - 14:30	3.50	DRLPRO	06	E	P		WIPER TRIP 25 STANDS
	14:30 - 19:00	4.50	DRLPRO	05	A	P		CIRC BTM UP HAD 32 BBL GAIN RAISE MUD WT 12.0 PPG - LOST COMPLETE RETURNS LOST 350 BBLS & RAISE LCM 20% REGAIN CIRC.
	19:00 - 0:00	5.00	DRLPRO	06	B	P		T.O.H F/ LOGS - TIGHT SPOT @ 6237 - 4356
2/7/2012	0:00 - 3:00	3.00	DRLPRO	06	B	P		T.O.H F/ LOGS
	3:00 - 3:30	0.50	DRLPRO	14	A	P		PULL WEAR BUSHING
	3:30 - 8:30	5.00	DRLPRO	11	E	P		R/U HELD S/M & R/U HALLIBURTON WIRELINE RUN TRIPLE COMBO @ 6267 - BRIDGED OUT
	8:30 - 19:30	11.00	DRLPRO	12	C	P		HELD S/M &R/U FRANKS CSG CREW & 4.5 PROD CASING RUN 227 JTS PLUS 2 MARKERS & SHOE SET @ 9564 - F/C @ 9544
	19:30 - 20:30	1.00	DRLPRO	05	D	P		CIRC BTM UP
	20:30 - 23:00	2.50	DRLPRO	12				SAFETY MEET W/ BJ SER,R/U PRESSURE TEST TO 5K,PUMP 25 BBL FRESH,WATER & ,516 SX LEAD @12.5 2.02 YLD- PLII+8%GEL +4%R-3+2%SMS+25#SK CELLOFLAKE+5#SK KOL-SEAL , F/ TAIL 1145 SKS # 14.3 - YLD 1.31 YLD 50:50+2%GEL+10%SALT+2%R-3 & ,DISPLACE 148 BBLS,FINAL LIFT 2410 PSI ,BUMP PLUG W/ 500 OVER & FLOATS HELD, 5 BBL CEMENT BACK TO PIT, 1.5 BBLS WATER BACK TO TRUCK
	23:00 - 0:00	1.00	DRLPRO	14	A	P		N/D & SET C-22 SLIPS W/ 115K & ROUGH CUT 4.5
2/8/2012	0:00 - 4:00	4.00	DRLPRO	14	B	P		WASH CLEAN OUT MUD TANKS & RELEASED RIG @ 04:00 ON 2/8/2012

1 General

1.1 Customer Information

Company	US ROCKIES REGION
Representative	
Address	

1.2 Well/Wellbore Information

Well	NBU 922-30D3DS RED	**Wellbore No.**	OH
Well Name	NBU 922-30D3DS	**Wellbore Name**	NBU 922-30D3DS
Report No.	1	**Report Date**	5/25/2012
Project	UTAH-UINTAH	**Site**	NBU 922-30D PAD
Rig Name/No.		**Event**	COMPLETION
Start Date	5/25/2012	**End Date**	6/12/2012
Spud Date	1/7/2012	**Active Datum**	RKB @4,939.00usft (above Mean Sea Level)
UWI	NW/NW/0/9/S/22/E/30/0/0/26/PM/N/1226/W/0/588/0/0		

1.3 General

Contractor		**Job Method**		**Supervisor**	
Perforated Assembly		**Conveyed Method**			

1.4 Initial Conditions

Fluid Type		**Fluid Density**	
Surface Press		**Estimate Res Press**	
TVD Fluid Top		**Fluid Head**	
Hydrostatic Press		**Press Difference**	
Balance Cond	NEUTRAL		

1.5 Summary

Gross Interval	6,116.0 (usft)-9,326.0 (usft	**Start Date/Time**	5/25/2012 12:00AM
No. of Intervals	79	**End Date/Time**	5/25/2012 12:00AM
Total Shots	264	**Net Perforation Interval**	88.00 (usft)
Avg Shot Density	3.00 (shot/ft)	**Final Surface Pressure**	
		Final Press Date	

2 Intervals

2.1 Perforated Interval

Date	Formation/ Reservoir	CCL@ (usft)	CCL-TS (usft)	MD Top (usft)	MD Base (usft)	Shot Density (shot/ft)	Misfires/ Add. Shot	Diameter (in)	Carr Type /Stage No	Carr Size (in)	Phasing (°)	Charge Desc /Charge Manufacturer	Charge Weight (gram)	Reason	Misrun
5/25/2012 12:00AM	WASATCH/			6,116.0	6,117.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	

2.1 Perforated Interval (Continued)

Date	Formation/ Reservoir	CCL@ (usft)	CCL-TS (usft)	MD Top (usft)	MD Base (usft)	Shot Density (shot/ft)	Misfires/ Add. Shot	Diameter (in)	Carr Type /Stage No	Carr Size (in)	Phasing (°)	Charge Desc /Charge Manufacturer	Charge Weight (gram)	Reason	Misrun
5/25/2012 12:00AM	WASATCH/			6,180.0	6,181.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			6,195.0	6,196.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			6,232.0	6,233.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			6,250.0	6,251.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			6,373.0	6,374.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			6,391.0	6,392.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			6,416.0	6,417.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			6,518.0	6,519.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			6,541.0	6,542.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			6,558.0	6,560.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			6,578.0	6,579.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			6,599.0	6,600.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			6,612.0	6,613.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			6,691.0	6,692.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			6,799.0	6,800.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			6,813.0	6,814.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			6,831.0	6,832.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			6,880.0	6,881.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			6,911.0	6,912.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			6,955.0	6,956.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			7,037.0	7,038.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	

2.1 Perforated Interval (Continued)

Date	Formation/ Reservoir	CCL@ (usft)	CCL-TS (usft)	MD Top (usft)	MD Base (usft)	Shot Density (shot/ft)	Misfires/ Add. Shot	Diameter (in)	Carr Type /Stage No	Carr Size (in)	Phasing (°)	Charge Desc /Charge Manufacturer	Charge Weight (gram)	Reason	Misrun
5/25/2012 12:00AM	WASATCH/			7,067.0	7,068.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			7,138.0	7,139.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			7,176.0	7,179.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			7,207.0	7,208.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			7,316.0	7,317.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	WASATCH/			7,340.0	7,342.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			7,426.0	7,429.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			7,465.0	7,466.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			7,508.0	7,509.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			7,581.0	7,582.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			7,591.0	7,592.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			7,603.0	7,604.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			7,664.0	7,668.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			7,759.0	7,760.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			7,819.0	7,820.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			7,837.0	7,838.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			7,880.0	7,881.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			7,949.0	7,950.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			7,971.0	7,972.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			7,993.0	7,994.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,014.0	8,015.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	

2.1 Perforated Interval (Continued)

Date	Formation/ Reservoir	CCL@ (usft)	CCL-TS (usft)	MD Top (usft)	MD Base (usft)	Shot Density (shot/ft)	Misfires/ Add. Shot	Diameter (in)	Carr Type /Stage No	Carr Size (in)	Phasing (°)	Charge Desc /Charge Manufacturer	Charge Weight (gram)	Reason	Misrun
5/25/2012 12:00AM	MESAVERDE/			8,044.0	8,045.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,094.0	8,095.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,134.0	8,135.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,188.0	8,189.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,275.0	8,276.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,296.0	8,297.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,319.0	8,320.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,338.0	8,339.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,380.0	8,381.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,410.0	8,411.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,524.0	8,525.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,539.0	8,540.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,651.0	8,652.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,668.0	8,669.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,692.0	8,693.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,734.0	8,735.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,765.0	8,766.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,779.0	8,780.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,803.0	8,804.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,840.0	8,841.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,874.0	8,875.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	

2.1 Perforated Interval (Continued)

Date	Formation/ Reservoir	CCL@ (usft)	CCL-TS (usft)	MD Top (usft)	MD Base (usft)	Shot Density (shot/ft)	Misfires/ Add. Shot	Diameter (in)	Carr Type /Stage No	Carr Size (in)	Phasing (°)	Charge Desc /Charge Manufacturer	Charge Weight (gram)	Reason	Misrun
5/25/2012 12:00AM	MESAVERDE/			8,890.0	8,891.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,905.0	8,906.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,929.0	8,930.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,955.0	8,956.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			8,995.0	8,996.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			9,027.0	9,028.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			9,057.0	9,058.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			9,089.0	9,090.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			9,112.0	9,113.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			9,135.0	9,136.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			9,144.0	9,145.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			9,233.0	9,234.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			9,259.0	9,260.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			9,311.0	9,312.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	
5/25/2012 12:00AM	MESAVERDE/			9,325.0	9,326.0	3.00		0.360	EXP/	3.375	120.00		23.00	PRODUCTION	

3 Plots

US ROCKIES REGION

Operation Summary Report

Well: NBU 922-30D3DS RED		Spud Date: 1/7/2012
Project: UTAH-UINTAH	Site: NBU 922-30D PAD	Rig Name No: MILES 2/2
Event: COMPLETION	Start Date: 5/25/2012	End Date: 6/12/2012
Active Datum: RKB @4,939.00usft (above Mean Sea Level)	UWI: NW/NW/0/9/S/22/E/30/0/0/26/PM/N/1226/W/0/588/0/0	

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation
1/7/2012	-							
1/8/2012	-							
5/25/2012	5:45 - 6:00	0.25	COMP	48		P		HELD SAFETY MEETING: HIGH PRESSURE
	6:00 - 7:30	1.50	COMP	33		P		FILL SURFACE CSG. MIRU B&C QUICK TEST. PSI TEST T/ 1000 PSI. HELD FOR 15 MIN LOST 9 PSI. PSI TEST T/ 3500 PSI. HELD FOR 15 MIN LOST 27 PSI. 1ST PSI TEST T/ 7000 PSI. HELD FOR 30 MIN LOST 80 PSI. NO COMMUNICATION OR MIGRATION WITH SURFACE CSG BLEED OFF PSI. MOVE T/ NEXT WELL. SWIFW
5/26/2012	-							
6/1/2012	8:30 - 8:45	0.25	COMP	48		P		HSM & JSA W/CASEDHOLE SOLUATIONS.
	13:05 - 14:10	1.08	COMP	37	B	P		WHP 0 PSI. MIRU CASEDHOLE SOLUATIONS. STG 1) P/U 3 1/8" EXP GNS, 23 gm, 0.36 HOLE, 24 HOLES. PERF THE M.V. AS PER DESIGN. POOH W/TOOLS & TIE BACK LUB. SWI - SDFWE
6/7/2012	5:30 - 5:45	0.25	COMP	48		P		MIRU HALLIBURTON & CASEDHOLE SOLUATIONS. HSM & JSA.
	12:57 - 13:30	0.55	COMP	36	E	P		FRAC STG 1) WHP 1715 PSI. BRK DWN PERF 5 BPM @ 3404 PSI. ISIP 2976 PSI. FG. 0.76. EST INJ RATE 49.7 BPM @ 4560 PSI. 24/24 PERFS OPEN - 100%. MP 5827 PSI, MR 50 BPM, AP 4578 PSI, AR 49.4 BPM. ISIP 2719 PSI, FG. 0.73, NPI (-257) PSI. PMP'D 1347 BBLS SLK WTR, 24,100 LBS 30/50 SND. X-OVER FOR WL.
	13:35 - 14:35	1.00	COMP	37	B	P		PERF STG 2) P/U HALCO 8K CBP & 3 1/8" EXP GNS, 23 GRM, 0.36 HOLE, 120 DEG PHSG. RIH SET CBP @ 9078'. PERF MESA VERDE AS PER PERF DESIGN. POOH & HANG BACK LUB. X-OVER FOR FRAC
	15:51 - 16:19	0.47	COMP	36	E	P		FRAC STG 2) WHP 2444 PSI. BRK DWN PERF 4.9 BPM @ 3650 PSI. ISIP 2505 PSI. FG. 0.71. EST INJ RATE 50 BPM @ 4477 PSI. 24/24 PERFS OPEN - 100%. MP 5066 PSI, MR 50.1 BPM, AP 4294 PSI, AR 49.7 BPM. ISIP 2486 PSI, FG. 0.71, NPI (-19) PSI. PMP'D 1192 BBLS SLK WTR, 24,500 LBS 30/50 SND. X-OVER FOR WL.
	16:24 - 17:24	1.00	COMP	37	B	P		PERF STG 3) P/U HALCO 8K CBP & 3 1/8" EXP GNS, 23 GRM, 0.36 HOLE, 120 DEG PHSG. RIH SET CBP @ 8861'. PERF MESA VERDE AS PER PERF DESIGN. POOH & HANG BACK LUB. X-OVER FOR FRAC
6/8/2012	6:30 - 6:54	0.40	COMP	48		P		HSM & JSA W/HALLIBURTON & CASEDHOLE SOLUATIONS

US ROCKIES REGION

Operation Summary Report

Well: NBU 922-30D3DS RED		Spud Date: 1/7/2012	
Project: UTAH-UINTAH	Site: NBU 922-30D PAD		Rig Name No: MILES 2/2
Event: COMPLETION	Start Date: 5/25/2012		End Date: 6/12/2012
Active Datum: RKB @4,939.00usft (above Mean Sea Level)	UWI: NW/NW/0/9/S/22/E/30/0/0/26/PM/N/1226/W/0/588/0/0		

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation
	6:54 - 7:29	0.58	COMP	36	E	P		FRAC STG 3) WHP 1925 PSI. BRK DWN PERF 4.8 BPM @ 4140 PSI. ISIP 2725 PSI. FG. 0.74. EST INJ RATE 50.1 BPM @ 4408 PSI. 24/24 PERFS OPEN - 100%. MP 6121 PSI, MR 50.2 BPM, AP 4214 PSI, AR 49.7 BPM. ISIP 2574 PSI, FG. 0.73, NPI (-151) PSI. PMP'D 1482 BBLS SLK WTR, 31,100 LBS 30/50 SND. X-OVER FOR WL.
	7:34 - 8:34	1.00	COMP	37	B	P		PERF STG 4) P/U HALCO 8K CBP & 3 1/8" EXP GNS, 23 GRM, 0.36 HOLE, 120 DEG PHSG. RIH SET CBP @ 8590'. PERF MESA VERDE AS PER PERF DESIGN. POOH & HANG BACK LUB. X-OVER FOR FRAC
	8:51 - 9:20	0.48	COMP	36	E	P		FRAC STG 4) WHP 894 PSI. BRK DWN PERF 5.1 BPM @ 2327 PSI. ISIP 2005 PSI. FG. 0.67. EST INJ RATE 50.2 BPM @ 4225 PSI. 24/24 PERFS OPEN - 100%. MP 5744 PSI, MR 50.3 BPM, AP 4089 PSI, AR 50.2 BPM. ISIP 2609 PSI, FG. 0.74, NPI 604 PSI. PMP'D 1250 BBLS SLK WTR, 25,500 LBS 30/50 SND. X-OVER FOR WL.
	9:25 - 10:25	1.00	COMP	37	B	P		PERF STG 5) P/U HALCO 8K CBP & 3 1/8" EXP GNS, 23 GRM, 0.36 HOLE, 120 DEG PHSG. RIH SET CBP @ 8224'. PERF MESA VERDE AS PER PERF DESIGN. POOH & HANG BACK LUB. X-OVER FOR FRAC
	10:25 - 10:57	0.53	COMP	36	E	P		FRAC STG 5) WHP 2384 PSI. BRK DWN PERF 5 BPM @ 2944 PSI. ISIP 2581 PSI. FG. 0.75. EST INJ RATE 50.4 BPM @ 3445 PSI. 24/24 PERFS OPEN - 100%. MP 5985 PSI, MR 50.6 BPM, AP 3592 PSI, AR 49.8 BPM. ISIP 2196 PSI, FG. 0.71, NPI (-385) PSI. PMP'D 1152 BBLS SLK WTR, 23,500 LBS 30/50 SND. X-OVER FOR WL
	11:03 - 12:03	1.00	COMP	37	B	P		PERF STG 6) P/U HALCO 8K CBP & 3 1/8" EXP GNS, 23 GRM, 0.36 HOLE, 120 DEG PHSG. RIH SET CBP @ 7911'. PERF MESA VERDE AS PER PERF DESIGN. POOH & HANG BACK LUB. X-OVER FOR FRAC
	12:36 - 13:08	0.53	COMP	36	E	P		FRAC STG 6) WHP 350 PSI. BRK DWN PERF 5 BPM @ 4712 PSI. ISIP 2320 PSI. FG. 0.73. EST INJ RATE 49.5 BPM @ 4049 PSI. 24/24 PERFS OPEN - 100%. MP 4868 PSI, MR 50 BPM, AP 3726 PSI, AR 49.9 BPM. ISIP 2309 PSI, FG. 0.73, NPI (-11) PSI. PMP'D 1363 BBLS SLK WTR, 27,100 LBS 30/50 SND. X-OVER FOR WL.
	13:13 - 14:13	1.00	COMP	37	B	P		PERF STG 7) P/U HALCO 8K CBP & 3 1/8" EXP GNS, 23 GRM, 0.36 HOLE, 120 DEG PHSG. RIH SET CBP @ 7634'. PERF MESA VERDE AS PER PERF DESIGN. POOH & HANG BACK LUB. X-OVER FOR FRAC
	15:47 - 16:20	0.55	COMP	36	E	P		FRAC STG 7) WHP 1900 PSI. BRK DWN PERF 4.5 BPM @ 2606 PSI. ISIP 2035 PSI. FG. 0.70. EST INJ RATE 49.9 BPM @ 3460 PSI. 24/24 PERFS OPEN - 100%. MP 4383 PSI, MR 50.7 BPM, AP 3492 PSI, AR 49.9 BPM. ISIP 2143 PSI, FG. 0.72, NPI 108 PSI. PMP'D 1417 BBLS SLK WTR, 29,600 LBS 30/50 SND. X-OVER FOR WL

US ROCKIES REGION

Operation Summary Report

Well: NBU 922-30D3DS RED		Spud Date: 1/7/2012
Project: UTAH-UINTAH	Site: NBU 922-30D PAD	Rig Name No: MILES 2/2
Event: COMPLETION	Start Date: 5/25/2012	End Date: 6/12/2012
Active Datum: RKB @4,939.00usft (above Mean Sea Level)	UWI: NW/NW/0/9/S/22/E/30/0/0/26/PM/N/1226/W/0/588/0/0	

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation
	16:25 - 17:25	1.00	COMP	37	B	P		PERF STG 8) P/U HALCO 8K CBP & 3 1/8" EXP GNS, 23 GRM, 0.36 HOLE, 120 DEG PHSG. RIH SET CBP @ 7372'. PERF WASATCH AS PER PERF DESIGN. POOH & HANG BACK LUB. X-OVER FOR FRAC
	17:29 - 17:51	0.37	COMP	36	E	P		FRAC STG 8) WHP 202 PSI. BRK DWN PERF 5 BPM @ 1980 PSI. ISIP 1108 PSI. FG. 0.59. EST INJ RATE 49.9 BPM @ 3863 PSI. 19/24 PERFS OPEN - 76%. MP 4218 PSI, MR 49.9 BPM, AP 3794 PSI, AR 49.8 BPM. ISIP 2263 PSI, FG. 0.75, NPI 1155 PSI. PMP'D 817 BBLS SLK WTR, 23,200 LBS 30/50 SND. X-OVER FOR WL. SWI - SDFN.
6/9/2012	6:30 - 7:20	0.83	COMP	37	B	P		PERF STG 9) P/U HALCO 8K CBP & 3 1/8" EXP GNS, 23 GRM, 0.36 HOLE, 120 DEG PHSG. RIH SET CBP @ 7098'. PERF WASATCH AS PER PERF DESIGN. POOH & HANG BACK LUB. X-OVER FOR FRAC
	7:27 - 7:52	0.42	COMP	36	E	P		FRAC STG 9) WHP 736 PSI. BRK DWN PERF 4.8 BPM @ 4270 PSI. ISIP 2807 PSI. FG. 0.84. EST INJ RATE 47 BPM @ 3529 PSI. 24/24 PERFS OPEN - 100%. MP 5600 PSI, MR 50.1 BPM, AP 3568 PSI, AR 47.5 BPM. ISIP 1988 PSI, FG. 0.72, NPI (-819) PSI. PMP'D 719 BBLS SLK WTR, 20,000 LBS 30/50 SND. X-OVER FOR WL.
	7:52 - 8:52	1.00	COMP	37	B	P		PERF STG 10) P/U HALCO 8K CBP & 3 1/8" EXP GNS, 23 GRM, 0.36 HOLE, 120 DEG PHSG. RIH SET CBP @ 6742'. PERF WASATCH AS PER PERF DESIGN. POOH & HANG BACK LUB. X-OVER FOR FRAC
	9:47 - 10:25	0.63	COMP	36	E	P		FRAC STG 10) WHP 900 PSI. BRK DWN PERF 4.8 BPM @ 5077 PSI. ISIP 2882 PSI. FG. 0.87. EST INJ RATE 49.4 BPM @ 3203 PSI. 24/24 PERFS OPEN - 100%. MP 6868 PSI, MR 49.8 BPM, AP 2907 PSI, AR 49.7 BPM. ISIP 1519 PSI, FG. 0.66, NPI (-1363) PSI. PMP'D 868 BBLS SLK WTR, 23,400 LBS 30/50 SND. X-OVER FOR WL.
	10:25 - 11:25	1.00	COMP	37	B	P		PERF STG 11) P/U HALCO 8K CBP & 3 1/8" EXP GNS, 23 GRM, 0.36 HOLE, 120 DEG PHSG. RIH SET CBP @ 6467'. PERF WASATCH AS PER PERF DESIGN. POOH & HANG BACK LUB. X-OVER FOR FRAC
	13:03 - 13:24	0.35	COMP	36	E	P		FRAC STG 11) WHP 1078 PSI. BRK DWN PERF 4.9 BPM @ 2720 PSI. ISIP 1181 PSI. FG. 0.62. EST INJ RATE 49.7 BPM @ 2720 PSI. 24/24 PERFS OPEN - 100%. MP 5458 PSI, MR 49.9 BPM, AP 2761 PSI, AR 49.8 BPM. ISIP 1114 PSI, FG. 0.61, NPI (-67) PSI. PMP'D 749 BBLS SLK WTR, 24980 LBS 30/50 SND. X-OVER FOR WL. P/U RIH W/ HALIBURTON 8K CBP, SET FOR KILL PLUG @6066' TOTAL WTR= 12,352 BBLS TOTAL SAND=276,880 LBS

US ROCKIES REGION

Operation Summary Report

Well: NBU 922-30D3DS RED		Spud Date: 1/7/2012
Project: UTAH-UINTAH	Site: NBU 922-30D PAD	Rig Name No: MILES 2/2
Event: COMPLETION	Start Date: 5/25/2012	End Date: 6/12/2012
Active Datum: RKB @4,939.00usft (above Mean Sea Level)	UWI: NW/NW/0/9/S/22/E/30/0/0/26/PM/N/1226/W/0/588/0/0	

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation
6/11/2012	1:00 - 5:00	4.00	DRLOUT	44		P		MIRU, NDWH, NU BOP'S, TEST BOP'S, SWIFN
6/12/2012	7:00 - 7:30	0.50	DRLOUT	48		P		DRILL PLUGS
	7:30 - 17:30	10.00	DRLOUT	44		P		PU BHA, TIH TO 6066', 191 JTS TAG PLUG # 1, NU PWR SWIVEL,DRILL 11 PLUGS PLUG# 1 6066' 30' SAND 5 MIN 0# KICK PLUG# 2 6467' 40' SAND 5 MIN 0# KICK PLUG# 3 6742' 40' SAND 5 MIN 50# KICK PLUG# 4 7098' 30' SAND 5 MIN 300# KICK PLUG# 5 7372' 90' SAND 5 MIN 500# KICK PLUG# 6 7634' 30' SAND 5 MIN 300# KICK PLUG# 7 7911' 40' SAND 5 MIN 800# KICK PLUG# 8 8224' 30' SAND 5 MIN 600# KICK PLUG# 9 8590' 30' SAND 5 MIN 700# KICK PLUG# 10 8861' 30' SAND 5MIN 300# KICK PLUG# 11 9078' 30' SAND 5 MIN 300# KICK C/O TO PBTD 9481.16', LAND TBG, EOT 8854.74', ND BOP'S, NUWH, DROP BALL, POBS, 3000#, TURN TO FBC, SDFN PBTD 9556' BTM PERF 9326' TBG 279 JTS 8837.71' HANGER 4.124" .83' KB 14.00' XNSN 1.875" 2.20' EOT 8854.74' FRAC WTR 12,352 BBLS RCD 3,400 BBLS LTR 8,952 BBLS
	18:00 - 18:30	0.50	DRLOUT	50				WELL TURNED TO SALES @ 1800 HR ON 6/12/2012, 2000 MCFD, 1920 BWPD, FCP 2100#, FTP 2200#, 20/64" CK.

Scientific Drilling
Rocky Mountain Operations

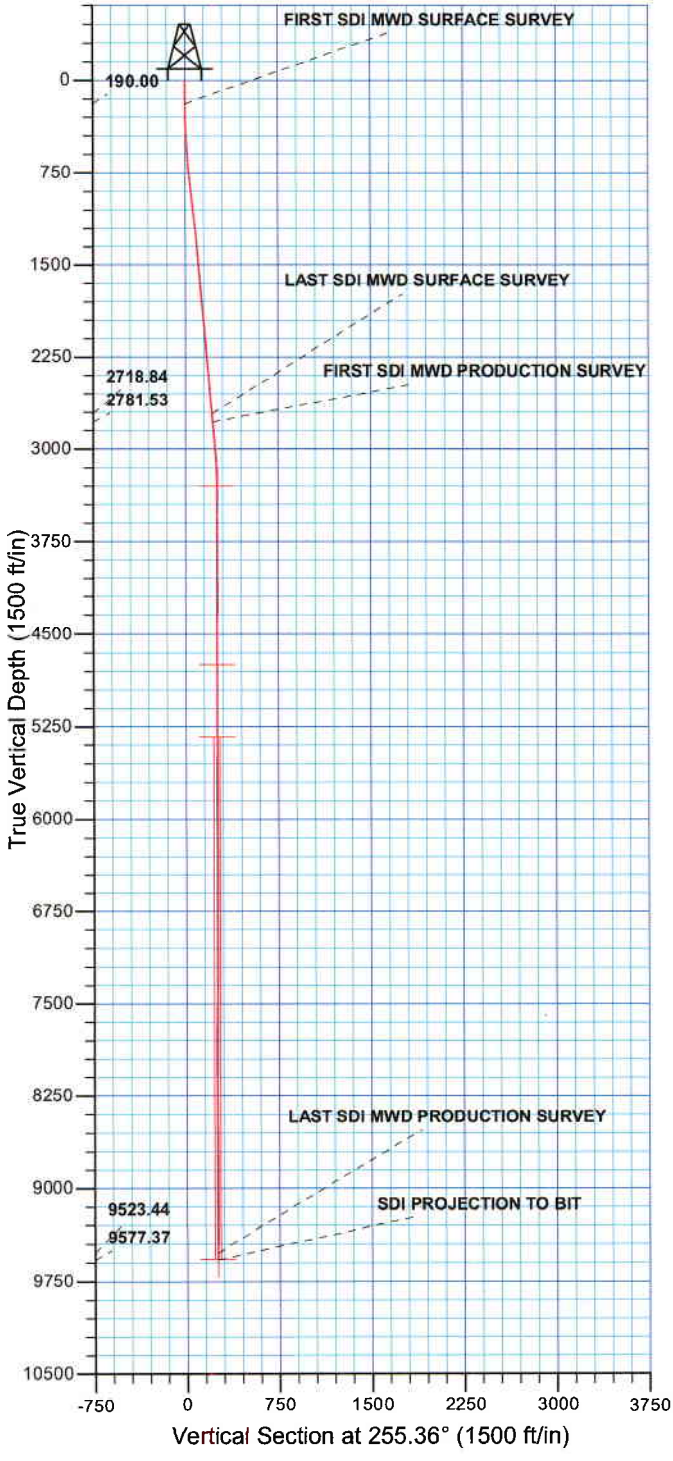
Project: Uintah County, UT UTM12
Site: NBU 922-30D PAD
Well: NBU 922-30D3DS
Wellbore: OH
Design: OH

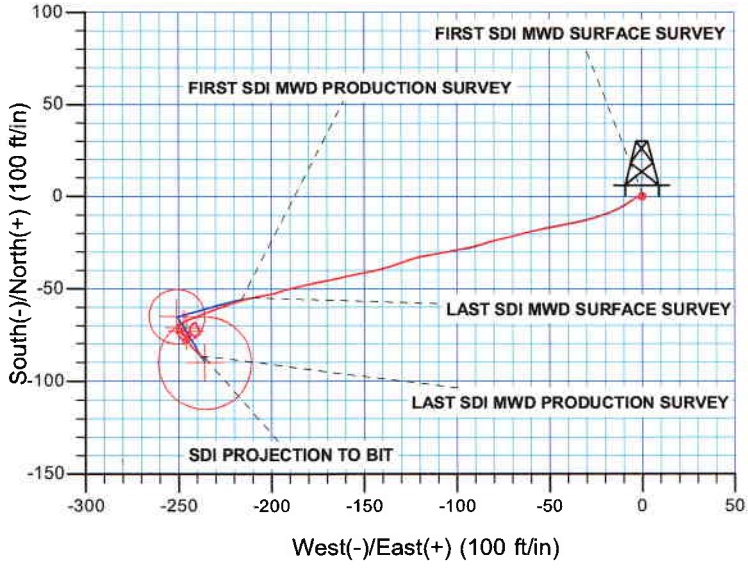
Anadarko Petroleum Corporation

WELL DETAILS: NBU 922-30D3DS					
GL 4925' & KB 14' @ 4939.00ft (ENSIGN 139)					
+N/-S	+E/-W	Northing	Easting	Latitude	Longitude
0.00	0.00	14533612.02	2063838.78	40.010916	-109.487883

Azimuths to True North
Magnetic North: 11.08°

Magnetic Field
Strength: 52340.5snT
Dip Angle: 65.88°
Date: 06/02/2011
Model: IGRF2010





PROJECT DETAILS: Uintah County, UT UTM12	
Geodetic System:	Universal Transverse Mercator (US Survey Feet)
Datum:	NAD 1927 - Western US
Ellipsoid:	Clarke 1866
Zone:	Zone 12N (114 W to 108 W)
Location:	SECTION 30 T9S R22E
System Datum:	Mean Sea Level

Design: OH (NBU 922-30D3DS/OH)

Created By: Gabe Kendall Date: 9:42, March 01 2012

Scientific Drilling
Rocky Mountain Operations

Kerr McGee Oil and Gas Onshore LP

Uintah County, UT UTM12
NBU 922-30D PAD
NBU 922-30D3DS

OH

Design: OH

Standard Survey Report

01 March, 2012

Anadarko
Petroleum Corporation

Company:	Kerr McGee Oil and Gas Onshore LP	**Local Co-ordinate Reference:**	Well NBU 922-30D3DS
Project:	Uintah County, UT UTM12	**TVD Reference:**	GL 4925' & KB 14' @ 4939.00ft (ENSIGN 139)
Site:	NBU 922-30D PAD	**MD Reference:**	GL 4925' & KB 14' @ 4939.00ft (ENSIGN 139)
Well:	NBU 922-30D3DS	**North Reference:**	True
Wellbore:	OH	**Survey Calculation Method:**	Minimum Curvature
Design:	OH	**Database:**	EDM 5000.1 Single User Db

Project Uintah County, UT UTM12

Map System:	Universal Transverse Mercator (US Survey Feet)	**System Datum:**	Mean Sea Level
Geo Datum:	NAD 1927 - Western US		
Map Zone:	Zone 12N (114 W to 108 W)		

Site NBU 922-30D PAD, SECTION 30 T9S R22E

Site Position:		**Northing:**	14,533,586.35 usft	**Latitude:**	40.010842
From:	Lat/Long	**Easting:**	2,063,914.56 usft	**Longitude:**	-109.487614
Position Uncertainty:	0.00 ft	**Slot Radius:**	13.200 in	**Grid Convergence:**	0.97 °

Well NBU 922-30D3DS, 1226 FNL 558 FWL

Well Position	**+N/-S**	0.00 ft	**Northing:**	14,533,612.02 usft	**Latitude:**	40.010916
	+E/-W	0.00 ft	**Easting:**	2,063,838.77 usft	**Longitude:**	-109.487883
Position Uncertainty		0.00 ft	**Wellhead Elevation:**	ft	**Ground Level:**	4,925.00 ft

Wellbore OH

Magnetics	**Model Name**	**Sample Date**	**Declination (°)**	**Dip Angle (°)**	**Field Strength (nT)**
	IGRF2010	06/02/11	11.08	65.88	52,341

Design OH

Audit Notes:

Version:	1.0	**Phase:**	ACTUAL	**Tie On Depth:**	0.00

Vertical Section:	**Depth From (TVD) (ft)**	**+N/-S (ft)**	**+E/-W (ft)**	**Direction (°)**
	0.00	0.00	0.00	255.36

Survey Program **Date** 03/01/12

From (ft)	**To (ft)**	**Survey (Wellbore)**	**Tool Name**	**Description**
10.00	2,729.00	Survey #1 SDI MWD SURFACE (OH)	MWD SDI	MWD - Standard ver 1.0.1
2,792.00	9,590.00	Survey #2 SDI MWD PRODUCTION (OH)	MWD SDI	MWD - Standard ver 1.0.1

Survey

Measured Depth (ft)	**Inclination (°)**	**Azimuth (°)**	**Vertical Depth (ft)**	**+N/-S (ft)**	**+E/-W (ft)**	**Vertical Section (ft)**	**Dogleg Rate (°/100ft)**	**Build Rate (°/100ft)**	**Turn Rate (°/100ft)**
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
10.00	0.00	0.00	10.00	0.00	0.00	0.00	0.00	0.00	0.00
190.00	0.46	55.61	190.00	0.41	0.60	-0.68	0.26	0.26	0.00
FIRST SDI MWD SURFACE SURVEY									
276.00	0.88	279.77	276.00	0.72	0.23	-0.40	1.46	0.49	-157.95
357.00	2.20	242.68	356.97	0.11	-1.76	1.68	1.96	1.63	-45.79
447.00	3.96	236.44	446.83	-2.40	-5.89	6.31	1.99	1.96	-6.93
537.00	4.22	241.01	536.60	-5.73	-11.38	12.45	0.46	0.29	5.08
627.00	4.75	248.75	626.33	-8.68	-17.74	19.36	0.89	0.59	8.60
717.00	5.10	252.62	716.00	-11.23	-25.04	27.06	0.54	0.39	4.30

Company:	Kerr McGee Oil and Gas Onshore LP	**Local Co-ordinate Reference:**	Well NBU 922-30D3DS
Project:	Uintah County, UT UTM12	**TVD Reference:**	GL 4925' & KB 14' @ 4939.00ft (ENSIGN 139)
Site:	NBU 922-30D PAD	**MD Reference:**	GL 4925' & KB 14' @ 4939.00ft (ENSIGN 139)
Well:	NBU 922-30D3DS	**North Reference:**	True
Wellbore:	OH	**Survey Calculation Method:**	Minimum Curvature
Design:	OH	**Database:**	EDM 5000.1 Single User Db

Survey

Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)
807.00	5.63	257.63	805.60	-13.37	-33.17	35.47	0.79	0.59	5.57
897.00	6.16	259.56	895.13	-15.19	-42.23	44.69	0.63	0.59	2.14
987.00	6.42	260.17	984.58	-16.92	-51.93	54.52	0.30	0.29	0.68
1,077.00	6.60	254.64	1,074.00	-19.15	-61.88	64.71	0.72	0.20	-6.14
1,167.00	6.16	254.81	1,163.45	-21.79	-71.53	74.71	0.49	-0.49	0.19
1,257.00	6.16	255.25	1,252.93	-24.28	-80.86	84.37	0.05	0.00	0.49
1,347.00	5.76	254.34	1,342.44	-26.73	-89.87	93.71	0.46	-0.44	-1.01
1,437.00	4.66	260.53	1,432.07	-28.55	-97.83	101.87	1.37	-1.22	6.88
1,527.00	4.48	258.77	1,521.78	-29.84	-104.88	109.02	0.25	-0.20	-1.96
1,617.00	4.45	257.36	1,611.51	-31.29	-111.74	116.02	0.13	-0.03	-1.57
1,707.00	4.84	260.17	1,701.21	-32.70	-118.89	123.29	0.50	0.43	3.12
1,797.00	5.80	250.15	1,790.83	-34.89	-126.90	131.60	1.48	1.07	-11.13
1,887.00	6.24	252.53	1,880.33	-37.90	-135.85	141.02	0.56	0.49	2.64
1,977.00	5.63	258.24	1,969.85	-40.27	-144.83	150.31	0.94	-0.68	6.34
2,067.00	5.10	260.00	2,059.45	-41.87	-153.10	158.71	0.62	-0.59	1.96
2,157.00	4.84	252.97	2,149.12	-43.67	-160.67	166.49	0.74	-0.29	-7.81
2,247.00	4.48	260.79	2,238.82	-45.35	-167.77	173.78	0.81	-0.40	8.69
2,337.00	5.19	259.38	2,328.50	-46.66	-175.24	181.34	0.80	0.79	-1.57
2,427.00	5.63	258.68	2,418.10	-48.28	-183.57	189.81	0.49	0.49	-0.78
2,517.00	5.10	252.70	2,507.70	-50.33	-191.71	198.21	0.86	-0.59	-6.64
2,607.00	5.01	255.69	2,597.35	-52.49	-199.34	206.14	0.31	-0.10	3.32
2,697.00	5.28	258.33	2,686.99	-54.30	-207.21	214.20	0.40	0.30	2.93
2,729.00	5.72	259.03	2,718.84	-54.90	-210.21	217.26	1.39	1.38	2.19
LAST SDI MWD SURFACE SURVEY									
2,792.00	5.63	254.18	2,781.53	-56.34	-216.27	223.49	0.77	-0.14	-7.70
FIRST SDI MWD PRODUCTION SURVEY									
2,883.00	5.45	252.62	2,872.11	-58.85	-224.69	232.27	0.26	-0.20	-1.71
2,973.00	5.13	247.16	2,961.73	-61.69	-232.47	240.52	0.66	-0.36	-6.07
3,064.00	4.27	246.32	3,052.42	-64.63	-239.33	247.89	0.95	-0.95	-0.92
3,154.00	2.93	247.22	3,142.24	-66.87	-244.52	253.48	1.49	-1.49	1.00
3,244.00	1.35	247.32	3,232.18	-68.17	-247.62	256.80	1.76	-1.76	0.11
3,335.00	0.60	225.87	3,323.16	-68.91	-248.95	258.28	0.90	-0.82	-23.57
3,425.00	0.72	213.88	3,413.16	-69.71	-249.60	259.11	0.20	0.13	-13.32
3,516.00	0.97	195.69	3,504.15	-70.92	-250.13	259.93	0.40	0.27	-19.99
3,606.00	0.57	185.62	3,594.14	-72.10	-250.38	260.47	0.47	-0.44	-11.19
3,697.00	0.53	133.50	3,685.13	-72.84	-250.12	260.41	0.53	-0.04	-57.27
3,787.00	0.78	345.33	3,775.13	-72.54	-249.97	260.19	1.40	0.28	-164.63
3,878.00	1.13	346.25	3,866.12	-71.07	-250.34	260.17	0.38	0.38	1.01
3,968.00	0.45	340.18	3,956.11	-69.87	-250.67	260.19	0.76	-0.76	-6.74
4,058.00	0.43	3.77	4,046.11	-69.20	-250.77	260.12	0.20	-0.02	26.21
4,149.00	0.90	170.45	4,137.10	-69.57	-250.63	260.07	1.45	0.52	183.16
4,240.00	0.30	123.19	4,228.10	-70.40	-250.31	259.98	0.80	-0.66	-51.93
4,330.00	0.42	100.92	4,318.10	-70.59	-249.79	259.52	0.20	0.13	-24.74

Company:	Kerr McGee Oil and Gas Onshore LP	**Local Co-ordinate Reference:**	Well NBU 922-30D3DS
Project:	Uintah County, UT UTM12	**TVD Reference:**	GL 4925' & KB 14' @ 4939.00ft (ENSIGN 139)
Site:	NBU 922-30D PAD	**MD Reference:**	GL 4925' & KB 14' @ 4939.00ft (ENSIGN 139)
Well:	NBU 922-30D3DS	**North Reference:**	True
Wellbore:	OH	**Survey Calculation Method:**	Minimum Curvature
Design:	OH	**Database:**	EDM 5000.1 Single User Db

Survey

Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)
4,420.00	0.37	134.70	4,408.10	-70.86	-249.26	259.07	0.26	-0.06	37.53
4,511.00	0.80	142.63	4,499.09	-71.57	-248.66	258.68	0.48	0.47	8.71
4,601.00	1.34	159.70	4,589.07	-73.06	-247.92	258.33	0.69	0.60	18.97
4,692.00	0.77	141.17	4,680.06	-74.53	-247.16	257.98	0.72	-0.63	-20.36
4,782.00	0.45	127.95	4,770.05	-75.22	-246.51	257.51	0.39	-0.36	-14.69
4,873.00	0.69	142.07	4,861.05	-75.87	-245.89	257.08	0.30	0.26	15.52
4,963.00	0.64	153.53	4,951.04	-76.75	-245.33	256.76	0.16	-0.06	12.73
5,054.00	0.85	148.29	5,042.04	-77.78	-244.75	256.46	0.24	0.23	-5.76
5,144.00	0.19	108.42	5,132.03	-78.39	-244.26	256.14	0.79	-0.73	-44.30
5,235.00	0.51	355.08	5,223.03	-78.04	-244.15	255.94	0.67	0.35	-124.55
5,325.00	0.87	322.59	5,313.02	-77.10	-244.60	256.14	0.58	0.40	-36.10
5,416.00	0.72	304.19	5,404.02	-76.23	-245.49	256.78	0.32	-0.16	-20.22
5,506.00	0.66	281.06	5,494.01	-75.81	-246.47	257.62	0.31	-0.07	-25.70
5,597.00	0.87	315.13	5,585.00	-75.22	-247.47	258.44	0.54	0.23	37.44
5,687.00	0.85	338.49	5,674.99	-74.11	-248.19	258.87	0.39	-0.02	25.96
5,778.00	0.63	307.82	5,765.98	-73.18	-248.84	259.25	0.49	-0.24	-33.70
5,868.00	0.40	298.44	5,855.98	-72.73	-249.50	259.78	0.27	-0.26	-10.42
5,959.00	0.37	274.43	5,946.98	-72.55	-250.08	260.29	0.18	-0.03	-26.38
6,049.00	0.41	234.89	6,036.98	-72.72	-250.63	260.87	0.30	0.04	-43.93
6,140.00	0.59	169.63	6,127.97	-73.36	-250.81	261.21	0.62	0.20	-71.71
6,230.00	0.88	135.53	6,217.97	-74.31	-250.24	260.90	0.57	0.32	-37.89
6,321.00	1.33	152.99	6,308.95	-75.75	-249.28	260.33	0.61	0.49	19.19
6,411.00	1.04	151.13	6,398.93	-77.40	-248.41	259.90	0.33	-0.32	-2.07
6,502.00	0.37	105.45	6,489.92	-78.20	-247.72	259.45	0.91	-0.74	-50.20
6,592.00	0.59	55.40	6,579.92	-78.01	-247.06	258.76	0.50	0.24	-55.61
6,683.00	0.60	32.94	6,670.92	-77.35	-246.42	257.97	0.25	0.01	-24.68
6,773.00	0.44	63.52	6,760.91	-76.80	-245.85	257.28	0.35	-0.18	33.98
6,864.00	0.60	86.47	6,851.91	-76.61	-245.06	256.47	0.29	0.18	25.22
6,954.00	0.70	102.04	6,941.90	-76.70	-244.06	255.52	0.22	0.11	17.30
7,045.00	0.40	342.81	7,032.90	-76.51	-243.61	255.03	1.06	-0.33	-131.02
7,136.00	1.32	358.33	7,123.89	-75.16	-243.73	254.81	1.03	1.01	17.05
7,226.00	1.23	357.10	7,213.87	-73.16	-243.81	254.38	0.10	-0.10	-1.37
7,317.00	0.66	348.04	7,304.85	-71.67	-243.97	254.16	0.65	-0.63	-9.96
7,407.00	0.71	42.16	7,394.85	-70.75	-243.70	253.67	0.69	0.06	60.13
7,498.00	0.92	26.19	7,485.84	-69.68	-243.00	252.72	0.34	0.23	-17.55
7,589.00	0.97	44.88	7,576.83	-68.48	-242.13	251.58	0.34	0.05	20.54
7,679.00	0.58	114.19	7,666.82	-68.12	-241.18	250.57	1.04	-0.43	77.01
7,769.00	1.17	152.15	7,756.81	-69.12	-240.34	250.00	0.89	0.66	42.18
7,860.00	1.74	154.75	7,847.78	-71.19	-239.31	249.54	0.63	0.63	2.86
7,950.00	1.19	170.25	7,937.75	-73.35	-238.57	249.36	0.75	-0.61	17.22
8,041.00	0.48	235.33	8,028.74	-74.50	-238.73	249.80	1.19	-0.78	71.52
8,131.00	0.86	262.65	8,118.74	-74.80	-239.71	250.83	0.54	0.42	30.36
8,222.00	0.64	233.12	8,209.73	-75.19	-240.79	251.98	0.48	-0.24	-32.45
8,312.00	0.33	188.00	8,299.73	-75.75	-241.23	252.54	0.52	-0.34	-50.13

Company:	Kerr McGee Oil and Gas Onshore LP	**Local Co-ordinate Reference:**	Well NBU 922-30D3DS
Project:	Uintah County, UT UTM12	**TVD Reference:**	GL 4925' & KB 14' @ 4939.00ft (ENSIGN 139)
Site:	NBU 922-30D PAD	**MD Reference:**	GL 4925' & KB 14' @ 4939.00ft (ENSIGN 139)
Well:	NBU 922-30D3DS	**North Reference:**	True
Wellbore:	OH	**Survey Calculation Method:**	Minimum Curvature
Design:	OH	**Database:**	EDM 5000.1 Single User Db

Survey

Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)
8,403.00	0.21	237.06	8,390.73	-76.10	-241.40	252.80	0.27	-0.13	53.91
8,493.00	1.26	323.48	8,480.72	-75.39	-242.13	253.32	1.40	1.17	96.02
8,584.00	0.97	325.57	8,571.70	-73.95	-243.16	253.96	0.32	-0.32	2.30
8,674.00	0.62	285.56	8,661.69	-73.20	-244.06	254.64	0.71	-0.39	-44.46
8,765.00	0.45	230.87	8,752.69	-73.29	-244.81	255.39	0.57	-0.19	-60.10
8,856.00	0.69	233.28	8,843.68	-73.84	-245.53	256.22	0.26	0.26	2.65
8,946.00	0.60	237.61	8,933.68	-74.42	-246.36	257.17	0.11	-0.10	4.81
9,037.00	0.38	158.92	9,024.68	-74.96	-246.66	257.59	0.71	-0.24	-86.47
9,130.00	1.11	156.12	9,117.67	-76.07	-246.18	257.41	0.79	0.78	-3.01
9,220.00	1.14	156.80	9,207.65	-77.69	-245.47	257.14	0.04	0.03	0.76
9,311.00	2.07	138.55	9,298.61	-79.75	-244.03	256.26	1.15	1.02	-20.05
9,401.00	2.11	139.47	9,388.55	-82.23	-241.88	254.81	0.06	0.04	1.02
9,492.00	2.41	134.87	9,479.48	-84.85	-239.43	253.10	0.38	0.33	-5.05
9,536.00	2.88	122.89	9,523.44	-86.10	-237.85	251.89	1.64	1.07	-27.23
LAST SDI MWD PRODUCTION SURVEY									
9,590.00	2.88	122.89	9,577.37	-87.58	-235.57	250.06	0.00	0.00	0.00
SDI PROJECTION TO BIT									

Design Annotations

Measured Depth (ft)	Vertical Depth (ft)	Local Coordinates +N/-S (ft)	Local Coordinates +E/-W (ft)	Comment
190.00	190.00	0.41	0.60	FIRST SDI MWD SURFACE SURVEY
2,729.00	2,718.84	-54.90	-210.21	LAST SDI MWD SURFACE SURVEY
2,792.00	2,781.53	-56.34	-216.27	FIRST SDI MWD PRODUCTION SURVEY
9,536.00	9,523.44	-86.10	-237.85	LAST SDI MWD PRODUCTION SURVEY
9,590.00	9,577.37	-87.58	-235.57	SDI PROJECTION TO BIT

Checked By: _____ Approved By: _____ Date: _____

Scientific Drilling
Rocky Mountain Operations

Kerr McGee Oil and Gas Onshore LP

Uintah County, UT UTM12
NBU 922-30D PAD
NBU 922-30D3DS

OH

Design: OH

Survey Report - Geographic

01 March, 2012

Anadarko
Petroleum Corporation

Company:	Kerr McGee Oil and Gas Onshore LP	**Local Co-ordinate Reference:**	Well NBU 922-30D3DS
Project:	Uintah County, UT UTM12	**TVD Reference:**	GL 4925' & KB 14' @ 4939.00ft (ENSIGN 139)
Site:	NBU 922-30D PAD	**MD Reference:**	GL 4925' & KB 14' @ 4939.00ft (ENSIGN 139)
Well:	NBU 922-30D3DS	**North Reference:**	True
Wellbore:	OH	**Survey Calculation Method:**	Minimum Curvature
Design:	OH	**Database:**	EDM 5000.1 Single User Db

Project Uintah County, UT UTM12

Map System:	Universal Transverse Mercator (US Survey Feet)	**System Datum:**	Mean Sea Level
Geo Datum:	NAD 1927 - Western US		
Map Zone:	Zone 12N (114 W to 108 W)		

Site NBU 922-30D PAD, SECTION 30 T9S R22E

Site Position:		**Northing:**	14,533,586.35 usft	**Latitude:**	40.010842
From:	Lat/Long	**Easting:**	2,063,914.56 usft	**Longitude:**	-109.487614
Position Uncertainty:	0.00 ft	**Slot Radius:**	13.200 in	**Grid Convergence:**	0.97 °

Well NBU 922-30D3DS, 1226 FNL 558 FWL

Well Position	**+N/-S**	0.00 ft	**Northing:**	14,533,612.02 usft	**Latitude:**	40.010916
	+E/-W	0.00 ft	**Easting:**	2,063,838.77 usft	**Longitude:**	-109.487883
Position Uncertainty		0.00 ft	**Wellhead Elevation:**	ft	**Ground Level:**	4,925.00 ft

Wellbore OH

Magnetics	**Model Name**	**Sample Date**	**Declination (°)**	**Dip Angle (°)**	**Field Strength (nT)**
	IGRF2010	06/02/11	11.08	65.88	52,341

Design OH

Audit Notes:

Version:	1.0	**Phase:**	ACTUAL	**Tie On Depth:**	0.00

Vertical Section:	**Depth From (TVD) (ft)**	**+N/-S (ft)**	**+E/-W (ft)**	**Direction (°)**
	0.00	0.00	0.00	255.36

Survey Program **Date** 03/01/12

From (ft)	**To (ft)**	**Survey (Wellbore)**	**Tool Name**	**Description**
10.00	2,729.00	Survey #1 SDI MWD SURFACE (OH)	MWD SDI	MWD - Standard ver 1.0.1
2,792.00	9,590.00	Survey #2 SDI MWD PRODUCTION (OH)	MWD SDI	MWD - Standard ver 1.0.1

Survey

Measured Depth (ft)	**Inclination (°)**	**Azimuth (°)**	**Vertical Depth (ft)**	**+N/-S (ft)**	**+E/-W (ft)**	**Map Northing (usft)**	**Map Easting (usft)**	**Latitude**	**Longitude**
0.00	0.00	0.00	0.00	0.00	0.00	14,533,612.02	2,063,838.77	40.010916	-109.487883
10.00	0.00	0.00	10.00	0.00	0.00	14,533,612.02	2,063,838.77	40.010916	-109.487883
190.00	0.46	55.61	190.00	0.41	0.60	14,533,612.44	2,063,839.36	40.010917	-109.487881
FIRST SDI MWD SURFACE SURVEY									
276.00	0.88	279.77	276.00	0.72	0.23	14,533,612.74	2,063,838.99	40.010918	-109.487882
357.00	2.20	242.68	356.97	0.11	-1.76	14,533,612.10	2,063,837.01	40.010916	-109.487890
447.00	3.96	236.44	446.83	-2.40	-5.89	14,533,609.52	2,063,832.93	40.010910	-109.487904
537.00	4.22	241.01	536.60	-5.73	-11.38	14,533,606.11	2,063,827.50	40.010900	-109.487924
627.00	4.75	248.75	626.33	-8.68	-17.74	14,533,603.04	2,063,821.18	40.010892	-109.487947
717.00	5.10	252.62	716.00	-11.23	-25.04	14,533,600.37	2,063,813.93	40.010885	-109.487973
807.00	5.63	257.63	805.60	-13.37	-33.17	14,533,598.09	2,063,805.84	40.010879	-109.488002

Company:	Kerr McGee Oil and Gas Onshore LP	**Local Co-ordinate Reference:**	Well NBU 922-30D3DS
Project:	Uintah County, UT UTM12	**TVD Reference:**	GL 4925' & KB 14' @ 4939.00ft (ENSIGN 139)
Site:	NBU 922-30D PAD	**MD Reference:**	GL 4925' & KB 14' @ 4939.00ft (ENSIGN 139)
Well:	NBU 922-30D3DS	**North Reference:**	True
Wellbore:	OH	**Survey Calculation Method:**	Minimum Curvature
Design:	OH	**Database:**	EDM 5000.1 Single User Db

Survey

Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Map Northing (usft)	Map Easting (usft)	Latitude	Longitude
897.00	6.16	259.56	895.13	-15.19	-42.23	14,533,596.12	2,063,796.81	40.010874	-109.488034
987.00	6.42	260.17	984.58	-16.92	-51.93	14,533,594.22	2,063,787.14	40.010870	-109.488069
1,077.00	6.60	254.64	1,074.00	-19.15	-61.88	14,533,591.82	2,063,777.23	40.010864	-109.488104
1,167.00	6.16	254.81	1,163.45	-21.79	-71.53	14,533,589.03	2,063,767.63	40.010856	-109.488139
1,257.00	6.16	255.25	1,252.93	-24.28	-80.86	14,533,586.37	2,063,758.34	40.010849	-109.488172
1,347.00	5.76	254.34	1,342.44	-26.73	-89.87	14,533,583.77	2,063,749.37	40.010843	-109.488204
1,437.00	4.66	260.53	1,432.07	-28.55	-97.83	14,533,581.82	2,063,741.44	40.010838	-109.488233
1,527.00	4.48	258.77	1,521.78	-29.84	-104.88	14,533,580.41	2,063,734.41	40.010834	-109.488258
1,617.00	4.45	257.36	1,611.51	-31.29	-111.74	14,533,578.85	2,063,727.58	40.010830	-109.488282
1,707.00	4.84	260.17	1,701.21	-32.70	-118.89	14,533,577.31	2,063,720.46	40.010826	-109.488308
1,797.00	5.80	250.15	1,790.83	-34.89	-126.90	14,533,574.98	2,063,712.48	40.010820	-109.488336
1,887.00	6.24	252.53	1,880.33	-37.90	-135.85	14,533,571.82	2,063,703.59	40.010812	-109.488368
1,977.00	5.63	258.24	1,969.85	-40.27	-144.83	14,533,569.30	2,063,694.64	40.010806	-109.488400
2,067.00	5.10	260.00	2,059.45	-41.87	-153.10	14,533,567.57	2,063,686.41	40.010801	-109.488430
2,157.00	4.84	252.97	2,149.12	-43.67	-160.67	14,533,565.63	2,063,678.87	40.010796	-109.488457
2,247.00	4.48	260.79	2,238.82	-45.35	-167.77	14,533,563.84	2,063,671.80	40.010792	-109.488482
2,337.00	5.19	259.38	2,328.50	-46.66	-175.24	14,533,562.40	2,063,664.36	40.010788	-109.488509
2,427.00	5.63	258.68	2,418.10	-48.28	-183.57	14,533,560.64	2,063,656.05	40.010784	-109.488539
2,517.00	5.10	252.70	2,507.70	-50.33	-191.71	14,533,558.45	2,063,647.94	40.010778	-109.488568
2,607.00	5.01	255.69	2,597.35	-52.49	-199.34	14,533,556.16	2,063,640.35	40.010772	-109.488595
2,697.00	5.28	258.33	2,686.99	-54.30	-207.21	14,533,554.21	2,063,632.52	40.010767	-109.488623
2,729.00	5.72	259.03	2,718.84	-54.90	-210.21	14,533,553.56	2,063,629.52	40.010765	-109.488634
LAST SDI MWD SURFACE SURVEY									
2,792.00	5.63	254.18	2,781.53	-56.34	-216.27	14,533,552.02	2,063,623.49	40.010761	-109.488655
FIRST SDI MWD PRODUCTION SURVEY									
2,883.00	5.45	252.62	2,872.11	-58.85	-224.69	14,533,549.37	2,063,615.12	40.010755	-109.488686
2,973.00	5.13	247.16	2,961.73	-61.69	-232.47	14,533,546.40	2,063,607.38	40.010747	-109.488713
3,064.00	4.27	246.32	3,052.42	-64.63	-239.33	14,533,543.34	2,063,600.58	40.010739	-109.488738
3,154.00	2.93	247.22	3,142.24	-66.87	-244.52	14,533,541.02	2,063,595.43	40.010733	-109.488756
3,244.00	1.35	247.32	3,232.18	-68.17	-247.62	14,533,539.67	2,063,592.35	40.010729	-109.488767
3,335.00	0.60	225.87	3,323.16	-68.91	-248.95	14,533,538.90	2,063,591.03	40.010727	-109.488772
3,425.00	0.72	213.88	3,413.16	-69.71	-249.60	14,533,538.09	2,063,590.39	40.010725	-109.488774
3,516.00	0.97	195.69	3,504.15	-70.92	-250.13	14,533,536.86	2,063,589.89	40.010721	-109.488776
3,606.00	0.57	185.62	3,594.14	-72.10	-250.38	14,533,535.68	2,063,589.66	40.010718	-109.488777
3,697.00	0.53	133.50	3,685.13	-72.84	-250.12	14,533,534.95	2,063,589.93	40.010716	-109.488776
3,787.00	0.78	345.33	3,775.13	-72.54	-249.97	14,533,535.25	2,063,590.07	40.010717	-109.488776
3,878.00	1.13	346.25	3,866.12	-71.07	-250.34	14,533,536.72	2,063,589.68	40.010721	-109.488777
3,968.00	0.45	340.18	3,956.11	-69.87	-250.67	14,533,537.91	2,063,589.33	40.010724	-109.488778
4,058.00	0.43	3.77	4,046.11	-69.20	-250.77	14,533,538.58	2,063,589.22	40.010726	-109.488779
4,149.00	0.90	170.45	4,137.10	-69.57	-250.63	14,533,538.21	2,063,589.37	40.010725	-109.488778
4,240.00	0.30	123.19	4,228.10	-70.40	-250.31	14,533,537.38	2,063,589.70	40.010723	-109.488777
4,330.00	0.42	100.92	4,318.10	-70.59	-249.79	14,533,537.20	2,063,590.22	40.010722	-109.488775
4,420.00	0.37	134.70	4,408.10	-70.86	-249.26	14,533,536.94	2,063,590.76	40.010722	-109.488773
4,511.00	0.80	142.63	4,499.09	-71.57	-248.66	14,533,536.24	2,063,591.36	40.010720	-109.488771
4,601.00	1.34	159.70	4,589.07	-73.06	-247.92	14,533,534.77	2,063,592.13	40.010716	-109.488768
4,692.00	0.77	141.17	4,680.06	-74.53	-247.16	14,533,533.31	2,063,592.91	40.010711	-109.488766
4,782.00	0.45	127.95	4,770.05	-75.22	-246.51	14,533,532.63	2,063,593.58	40.010710	-109.488763
4,873.00	0.69	142.07	4,861.05	-75.87	-245.89	14,533,531.99	2,063,594.21	40.010708	-109.488761
4,963.00	0.64	153.53	4,951.04	-76.75	-245.33	14,533,531.12	2,063,594.78	40.010705	-109.488759
5,054.00	0.85	148.29	5,042.04	-77.78	-244.75	14,533,530.10	2,063,595.38	40.010703	-109.488757
5,144.00	0.19	108.42	5,132.03	-78.39	-244.26	14,533,529.50	2,063,595.88	40.010701	-109.488755
5,235.00	0.51	355.08	5,223.03	-78.04	-244.15	14,533,529.85	2,063,595.99	40.010702	-109.488755
5,325.00	0.87	322.59	5,313.02	-77.10	-244.60	14,533,530.79	2,063,595.52	40.010704	-109.488757
5,416.00	0.72	304.19	5,404.02	-76.23	-245.49	14,533,531.64	2,063,594.61	40.010707	-109.488760
5,506.00	0.66	281.06	5,494.01	-75.81	-246.47	14,533,532.04	2,063,593.63	40.010708	-109.488763

Company:	Kerr McGee Oil and Gas Onshore LP	**Local Co-ordinate Reference:**	Well NBU 922-30D3DS
Project:	Uintah County, UT UTM12	**TVD Reference:**	GL 4925' & KB 14' @ 4939.00ft (ENSIGN 139)
Site:	NBU 922-30D PAD	**MD Reference:**	GL 4925' & KB 14' @ 4939.00ft (ENSIGN 139)
Well:	NBU 922-30D3DS	**North Reference:**	True
Wellbore:	OH	**Survey Calculation Method:**	Minimum Curvature
Design:	OH	**Database:**	EDM 5000.1 Single User Db

Survey

Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Map Northing (usft)	Map Easting (usft)	Latitude	Longitude
5,597.00	0.87	315.13	5,585.00	-75.22	-247.47	14,533,532.62	2,063,592.62	40.010710	-109.488767
5,687.00	0.85	338.49	5,674.99	-74.11	-248.19	14,533,533.71	2,063,591.87	40.010713	-109.488769
5,778.00	0.63	307.82	5,765.98	-73.18	-248.84	14,533,534.63	2,063,591.22	40.010715	-109.488772
5,868.00	0.40	298.44	5,855.98	-72.73	-249.50	14,533,535.07	2,063,590.54	40.010716	-109.488774
5,959.00	0.37	274.43	5,946.98	-72.55	-250.08	14,533,535.24	2,063,589.97	40.010717	-109.488776
6,049.00	0.41	234.89	6,036.98	-72.72	-250.63	14,533,535.07	2,063,589.42	40.010716	-109.488778
6,140.00	0.59	169.63	6,127.97	-73.36	-250.81	14,533,534.41	2,063,589.24	40.010715	-109.488779
6,230.00	0.88	135.53	6,217.97	-74.31	-250.24	14,533,533.48	2,063,589.83	40.010712	-109.488777
6,321.00	1.33	152.99	6,308.95	-75.75	-249.28	14,533,532.05	2,063,590.82	40.010708	-109.488773
6,411.00	1.04	151.13	6,398.93	-77.40	-248.41	14,533,530.42	2,063,591.72	40.010704	-109.488770
6,502.00	0.37	105.45	6,489.92	-78.20	-247.72	14,533,529.63	2,063,592.41	40.010701	-109.488768
6,592.00	0.59	55.40	6,579.92	-78.01	-247.06	14,533,529.83	2,063,593.07	40.010702	-109.488765
6,683.00	0.60	32.94	6,670.92	-77.35	-246.42	14,533,530.51	2,063,593.70	40.010704	-109.488763
6,773.00	0.44	63.52	6,760.91	-76.80	-245.85	14,533,531.06	2,063,594.26	40.010705	-109.488761
6,864.00	0.60	86.47	6,851.91	-76.61	-245.06	14,533,531.26	2,063,595.05	40.010706	-109.488758
6,954.00	0.70	102.04	6,941.90	-76.70	-244.06	14,533,531.19	2,063,596.06	40.010706	-109.488755
7,045.00	0.40	342.81	7,032.90	-76.51	-243.61	14,533,531.39	2,063,596.50	40.010706	-109.488753
7,136.00	1.32	358.33	7,123.89	-75.16	-243.73	14,533,532.74	2,063,596.35	40.010710	-109.488754
7,226.00	1.23	357.10	7,213.87	-73.16	-243.81	14,533,534.74	2,063,596.24	40.010715	-109.488754
7,317.00	0.66	348.04	7,304.85	-71.67	-243.97	14,533,536.22	2,063,596.06	40.010719	-109.488754
7,407.00	0.71	42.16	7,394.85	-70.75	-243.70	14,533,537.15	2,063,596.31	40.010722	-109.488753
7,498.00	0.92	26.19	7,485.84	-69.68	-243.00	14,533,538.23	2,063,596.99	40.010725	-109.488751
7,589.00	0.97	44.88	7,576.83	-68.48	-242.13	14,533,539.45	2,063,597.84	40.010728	-109.488748
7,679.00	0.58	114.19	7,666.82	-68.12	-241.18	14,533,539.82	2,063,598.78	40.010729	-109.488744
7,769.00	1.17	152.15	7,756.81	-69.12	-240.34	14,533,538.83	2,063,599.65	40.010726	-109.488741
7,860.00	1.74	154.75	7,847.78	-71.19	-239.31	14,533,536.78	2,063,600.70	40.010721	-109.488738
7,950.00	1.19	170.25	7,937.75	-73.35	-238.57	14,533,534.64	2,063,601.48	40.010715	-109.488735
8,041.00	0.48	235.33	8,028.74	-74.50	-238.73	14,533,533.49	2,063,601.35	40.010712	-109.488736
8,131.00	0.86	262.65	8,118.74	-74.80	-239.71	14,533,533.17	2,063,600.37	40.010711	-109.488739
8,222.00	0.64	233.12	8,209.73	-75.19	-240.79	14,533,532.76	2,063,599.30	40.010710	-109.488743
8,312.00	0.33	188.00	8,299.73	-75.75	-241.23	14,533,532.19	2,063,598.87	40.010708	-109.488745
8,403.00	0.21	237.06	8,390.73	-76.10	-241.40	14,533,531.84	2,063,598.70	40.010707	-109.488745
8,493.00	1.26	323.48	8,480.72	-75.39	-242.13	14,533,532.53	2,063,597.96	40.010709	-109.488748
8,584.00	0.97	325.57	8,571.70	-73.95	-243.16	14,533,533.95	2,063,596.90	40.010713	-109.488751
8,674.00	0.62	285.56	8,661.69	-73.20	-244.06	14,533,534.70	2,063,595.99	40.010715	-109.488755
8,765.00	0.45	230.87	8,752.69	-73.29	-244.81	14,533,534.59	2,063,595.24	40.010715	-109.488757
8,856.00	0.69	233.28	8,843.68	-73.84	-245.53	14,533,534.03	2,063,594.53	40.010713	-109.488760
8,946.00	0.60	237.61	8,933.68	-74.42	-246.36	14,533,533.44	2,063,593.71	40.010712	-109.488763
9,037.00	0.38	158.92	9,024.68	-74.96	-246.66	14,533,532.89	2,063,593.43	40.010710	-109.488764
9,130.00	1.11	156.12	9,117.67	-76.07	-246.18	14,533,531.79	2,063,593.92	40.010707	-109.488762
9,220.00	1.14	156.80	9,207.65	-77.69	-245.47	14,533,530.18	2,063,594.65	40.010703	-109.488760
9,311.00	2.07	138.55	9,298.61	-79.75	-244.03	14,533,528.14	2,063,596.13	40.010697	-109.488755
9,401.00	2.11	139.47	9,388.55	-82.23	-241.88	14,533,525.70	2,063,598.33	40.010690	-109.488747
9,492.00	2.41	134.87	9,479.48	-84.85	-239.43	14,533,523.12	2,063,600.82	40.010683	-109.488738
9,536.00	2.88	122.89	9,523.44	-86.10	-237.85	14,533,521.90	2,063,602.42	40.010680	-109.488733
LAST SDI MWD PRODUCTION SURVEY									
9,590.00	2.88	122.89	9,577.37	-87.58	-235.57	14,533,520.46	2,063,604.72	40.010676	-109.488724
SDI PROJECTION TO BIT									

Company:	Kerr McGee Oil and Gas Onshore LP	**Local Co-ordinate Reference:**	Well NBU 922-30D3DS
Project:	Uintah County, UT UTM12	**TVD Reference:**	GL 4925' & KB 14' @ 4939.00ft (ENSIGN 139)
Site:	NBU 922-30D PAD	**MD Reference:**	GL 4925' & KB 14' @ 4939.00ft (ENSIGN 139)
Well:	NBU 922-30D3DS	**North Reference:**	True
Wellbore:	OH	**Survey Calculation Method:**	Minimum Curvature
Design:	OH	**Database:**	EDM 5000.1 Single User Db

Design Annotations

Measured Depth (ft)	Vertical Depth (ft)	Local Coordinates +N/-S (ft)	Local Coordinates +E/-W (ft)	Comment
190.00	190.00	0.41	0.60	FIRST SDI MWD SURFACE SURVEY
2,729.00	2,718.84	-54.90	-210.21	LAST SDI MWD SURFACE SURVEY
2,792.00	2,781.53	-56.34	-216.27	FIRST SDI MWD PRODUCTION SURVEY
9,536.00	9,523.44	-86.10	-237.85	LAST SDI MWD PRODUCTION SURVEY
9,590.00	9,577.37	-87.58	-235.57	SDI PROJECTION TO BIT

Checked By: _____ Approved By: _____ Date: _____